



Peptides 2008

*Chemistry of Peptides in Life Science,
Technology and Medicine*

*Proceedings of
The Thirtieth European Peptide Symposium*

*Edited by
Hilkka Lankinen*

FIPS 
Finnish Peptide Society
Societas Biochemica, Biophysica et Microbiologica Fenniae



ISBN 978-952-92-5198-8

Copyright © 2008 The Finnish Peptide Society and The European Peptide Society

Published by The Finnish Peptide Society

Layout and Cover design by Timo Päivärinta, PSWFolders Ltd

Manuscripts collected by CONGREX / Blue & White Conferences Oy using Abstractlogic®

All rights reserved. No part of this book may be reproduced or transmitted in any form by any means, mechanical, electronic, photocopying, recording or otherwise without the written permission of the copyright holder.

Produced in Finland

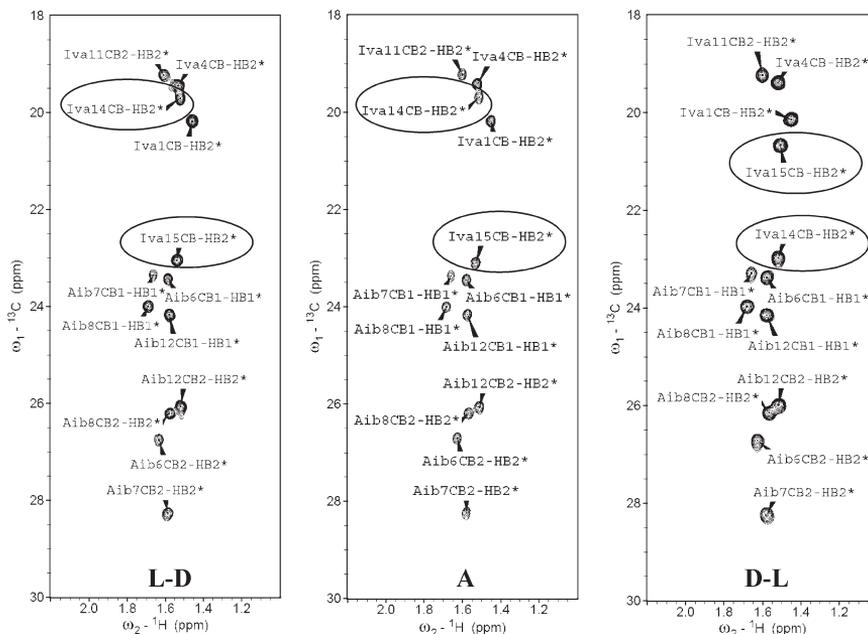


Figure 3. Comparison among the aliphatic regions of the ^{13}C -selective HMQC spectra of the natural integramide A (A), and the two synthetic diastereomers L-Iva14-D-Iva15 (L-D) and D-Iva14-L-Iva15 (D-L) in TFE, d_2 solution at 300 K. The peaks of the Iva14 and Iva15 residues are highlighted.

Our results clearly indicate that the chirality sequence of the Iva14-Iva15 dipeptide of the natural product is L-D. The stereochemical inversion in the two integramide A diastereomers, evaluated as inhibitors of HIV-1 integrase in the coupled reaction of proviral DNA into the host cell DNA, is in general not detrimental, but it is even slightly beneficial against the strand transfer reaction.

References

1. Singh S. B., Herath K., Guan Z., Zink D. L., Dombrowski A. W., Polishook J. D., Silverman K. C., Lingham R. B., Felock P. J., Hazuda D. J., *Org. Lett.* **4**: 1431-1434, 2002.