



## Polymeric Carrier Systems Enabling Transdermal Drug Delivery

Guest Editors:

**Dr. Christian Wiraja**

School of Physical and  
Mathematical Sciences, Nanyang  
Technological University,  
Singapore 639798, Singapore

**Dr. Chenjie Xu**

Department of Biomedical  
Engineering, City University of  
Hong Kong, 83 Tat Chee Avenue,  
Kowloon, Hong Kong, China

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### Message from the Guest Editors

In recent years, transdermal drug delivery (TDD) has been highly sought after to enable both localized and systemic therapy. Bypassing the gastro-intestinal and hepatic first-pass metabolism, TDD promises significant drug bioavailability with reduced risks of immune rejection. Moreover, TDD is non/minimally invasive, ensuring great patient compliance alongside the possibility of self-application. To this end, polymeric carrier systems (e.g., nanocarriers and microneedles) are widely explored to facilitate safe, efficacious, and well-controlled TDD. Facile preparation, flexibility in cargo moieties, tuneable release profile, and great biocompatibility are some advantages of polymer-based TDD carriers.

In this Special Issue, current efforts to develop and employ such polymeric TDD carriers are highlighted. The scope of this Special Issue will include techniques utilized to fabricate polymeric TDD carriers, methods to characterize and optimize drug loading and release profile (i.e., sustained-release, stimuli-responsiveness) as well as disease-specific adaptations for localized skin pathology and systemic diseases (e.g., diabetes mellitus).





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### Prof. Dr. Alexander Böker

Fraunhofer-Institut für  
Angewandte Polymerforschung,  
Lehrstuhl für Polymermaterialien  
und Polymertechnologie,  
Universität Potsdam,  
Geiselbergstraße 69, 14476  
Potsdam-Golm, Germany

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*Polymers* Editorial Office  
MDPI, Grosspeteranlage 5  
4052 Basel, Switzerland

Tel: +41 61 683 77 34  
www.mdpi.com

mdpi.com/journal/polymers  
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