



Universiteit
Leiden
The Netherlands

Synthetic peptides as tools in chemical immunology

Doelman, W.

Citation

Doelman, W. (2023, February 9). *Synthetic peptides as tools in chemical immunology*. Retrieved from <https://hdl.handle.net/1887/3563057>

Version: Publisher's Version

License: [Licence agreement concerning inclusion of doctoral thesis in the Institutional Repository of the University of Leiden](#)

Downloaded from: <https://hdl.handle.net/1887/3563057>

Note: To cite this publication please use the final published version (if applicable).

Synthetic Peptides as tools in Chemical Immunology

proefschrift

ter verkrijging van
de graad van doctor aan de Universiteit Leiden,
op gezag van rector magnificus prof.dr.ir. H. Bijl,
volgens besluit van het college voor promoties
te verdedigen op donderdag 9 februari 2023
klokke 10:00 uur

door

Ward Doelman

geboren te Utrecht
in 1994

Promotores: Prof. Dr. S.I. van Kasteren
Prof. Dr. H.S. Overkleeft

Promotiecommissie: Prof. Dr. M. Ubbink
Prof. Dr. N.I. Martin
Prof. Dr. A.J. Fairbanks (Canterbury, New Zealand)
Prof. Dr. J.D.C. Codée
Dr. M.T.C. Walvoort (RUG)

Cover design by Stijn Doelman

Printed by Ridderprint

Table of contents

Chapter 1	5
Synthesis of glycopeptide conjugates for immunological studies	
Chapter 2	47
Synthesis of asparagine derivatives harboring a Lewis ^X -type DC-SIGN ligand and evaluation of their immunomodulation	
Chapter 3	89
Citrullinated human and murine MOG ₃₅₋₅₅ display distinct biophysical and biochemical behavior	
Chapter 4	105
Synthesis of glycosylated and fluorescently labeled antigenic peptides for immune-receptor interaction studies	
Chapter 5	139
Synthesis of pre-organized cyclic ligands for the Cholera toxin B-subunit	
Chapter 6	169
Synthesis of peptides containing a combination of free and 2- <i>trans</i> -cyclooctene carbamate protected lysine residues	
Chapter 7	191
Summary and future prospects	
Nederlandse samenvatting	231
List of publications	235
<i>Curriculum Vitae</i>	237
Dankwoord	239

