Table of contents

Abbreviations 8

Chapter 1 General Introduction 9

Chapter 2 Achievement of a synergistic adjuvant effect on arthritis induction by activation of innate immunity and forcing the immune response toward the Th1 phenotype 31

Chapter 3 HSP70-specific immune responses are anti-inflammatory and inhibit proteoglycan-induced arthritis 53

Chapter 4 Naïve transgenic T cells expressing cartilage proteoglycan-specific TCR induce arthritis upon in vivo activation 71

Chapter 5 Increased arthritis susceptibility in cartilage proteoglycan-specific T cell receptor (TCR) transgenic mice 89

Chapter 6 Cartilage proteoglycan-specific T cell response in rheumatoid arthritis and osteoarthritis 109

Chapter 7 Summary and General discussion 129

Nederlandse samenvatting 143

Dankwoord 149

Curriculum vitae 153

List of publications 155