

Table of contents

List of figures.....	XIII
List of tables	XV
List of abbreviations	XVII
1 Introduction – matching two strands of research	1
1.1 Low-tech industries	3
1.1.1 Definition and business conditions of low-tech industries	3
1.1.2 Sources of knowledge and innovation in low-tech industries	5
1.1.3 Prospective trends of low-tech industries	10
1.2 Knowledge-intensive entrepreneurship (KIE)	12
1.2.1 Definitions and empirical relevance of KIE	12
1.2.2 Sources of KIE	16
1.2.3 Environmental conditions and institutional influences	18
1.3 The paradox of KIE in low-tech industries	21
1.4 Approaching KIE in low-tech industries	27
1.4.1 Broadening the understanding of innovation	27
1.4.2 Widening the understanding of entrepreneurship	29
1.4.3 Specifying KIE	32
1.5 Objectives of the thesis	38
2 Conceptual frame of reference.....	41
2.1 The concept of sectoral innovation systems.....	42
2.1.1 The knowledge dimension.....	43
2.1.2 The actor dimension.....	45
2.1.3 The institutional dimension.....	47
2.2 The concept of systemic KIE	50
2.2.1 Systemic entrepreneurial opportunities	52
2.2.2 The entrepreneurial propensity of innovation systems	57
2.3 The concept of institutional entrepreneurship.....	59
2.3.1 Extending the understanding of institutions.....	61
2.3.2 The institutional process of entrepreneurship.....	64
2.3.3 Institutional mechanisms.....	67
2.3.4 Institutional entrepreneurs' characteristics	71
2.3.5 Environmental conditions	75

2.4	Conclusions from conceptual framing	82
3	Methodological approach	87
3.1	The approach to implementation	87
3.2	The approach to analysis	96
4	The sectoral innovation system of the German textile industry	99
4.1	The knowledge dimension	100
4.2	The actor dimension	104
4.3	The institutional dimension	116
4.4	Results from the analysis of the German TIS	121
5	Knowledge-intensive entrepreneurship in the German textile industry... 125	
5.1	The case of FuncFiber	126
5.1.1	Sectoral knowledge base and technological opportunities	127
5.1.2	Market conditions and market opportunities	130
5.1.3	Institutional environment and institutional opportunities	133
5.1.4	Interim conclusion	140
5.1.5	Entrepreneurs	141
5.1.6	The KIE process	145
5.1.7	Conclusions from the case of FuncFiber	153
5.2	The case of E-Thread	154
5.2.1	Sectoral knowledge base and technological opportunities	155
5.2.2	Market conditions and market opportunities	159
5.2.3	Institutional environment and institutional opportunities	160
5.2.4	Interim conclusion	164
5.2.5	Corporate conditions and corporate opportunities	165
5.2.6	The entrepreneur	167
5.2.7	The KIE process	169
5.2.8	Conclusions from the case of E-Thread	177
5.3	The case of MultiTex	179
5.3.1	Sectoral knowledge base and technological opportunities	180
5.3.2	Market conditions and market opportunities	187
5.3.3	Institutional environment and institutional opportunities	190
5.3.4	Interim conclusion	195
5.3.5	Corporate conditions and corporate opportunities	195
5.3.6	The entrepreneur	198
5.3.7	The KIE process	199
5.3.8	Conclusions from the case of MultiTex	206
5.4	Results from cross-case study analysis	208

6	Discussion	215
6.1	Environmental conditions for KIE in low-tech industries	215
6.2	Characteristics of KIE in low-tech industries	225
6.3	Institutional influences of low-tech industries on the KIE process	242
7	Conclusions.....	249
7.1	The emergence of KIE in low-tech industries	250
7.2	The contribution of KIE to innovation in low-tech industries	253
7.3	Research outlook	256
8	References	261
9	Appendices	289

The Paradox of Knowledge-Intensive Entrepreneurship
in Low-Tech Industries
Evidence from Case Studies of the German Textile
Industry

Schwinge, I.

2015, XVIII, 296 p. 21 illus., Softcover

ISBN: 978-3-658-10936-3