

Contents

1	Introduction	1
1.1	The Context	1
1.1.1	Healthcare	1
1.1.2	Mobile Technology	2
1.1.3	Design Approach.	3
1.2	The Problem	4
1.2.1	Chronic Disease	4
1.2.2	Patients' Socio-Psychological Environment.	5
1.2.3	Patients' Involvement in Health Management	6
1.3	The Methodology	6
	References	9
2	Mobile Technologies as a Support Tool for Health	11
2.1	Mobile Communication and Connectivity for Social Interaction	11
2.1.1	The Essence of Mobile Technology and Connectivity	11
2.1.2	Connected Communities.	12
2.2	Mobile Devices as a Means of Communication Tool	13
2.2.1	Mobile Devices as High-Capability Processors	13
2.2.2	Mobile Devices as Connected Health Tool	14
2.3	Mobile Health	17
2.3.1	The Definition of Mobile Health (m-Health)	17
2.3.2	The Emergence of Health 2.0	18
2.3.3	Future Product Service System in Mobile Health.	20
2.3.4	Stakeholders of Mobile Health	24
2.4	Opportunities of Participation in Mobile Health	26
2.4.1	Social Networks in Health-Related Context.	26
2.4.2	Participatory Culture Through Social Media	28

2.5	Health Awareness as a Background Study	31
2.5.1	The Use of Mobile Diary Studies in Healthcare Context	33
	References	37
3	Research Strategies for Mobile Healthcare	43
3.1	Practiced-Based Approach.	43
3.2	Action Research Strategy	44
3.3	Qualitative Tools	47
3.3.1	Participant Observation	47
3.3.2	Diary Studies	49
3.3.3	Storytelling.	51
3.4	Prototyping	52
	References	53
4	Project: Locast Health Diary	57
4.1	Application Area: Childhood Obesity	57
4.2	Aim of the Project	64
4.3	Methods and Tools	66
4.4	Project Development	73
4.4.1	Research	73
4.4.2	Concept Development	77
4.4.3	Project Locast Health Diary	81
4.4.4	Deployment and Evaluation	86
4.4.5	Locast Health Diary Study	89
4.4.6	Results.	95
4.5	Evaluation	99
	References	110
5	Discussion	115
5.1	Towards Participatory Healthcare Services	115
5.1.1	Involvement of Individuals	115
5.1.2	Involvement of Stakeholders.	117
5.2	Next Steps in Locast Health Diary Project	119
5.3	Future Directions.	121
	References	122
	Index	123

Mobile Technologies as a Health Care Tool

Arslan, P.

2016, X, 123 p. 21 illus. in color., Softcover

ISBN: 978-3-319-05917-4