Language-Based Software Engineering

Models, algorithms, and tools are built around a target programming paradigm against a specific domain

Learning in Cyber-Physical Swarms
Part III
Combination of declarative programming approach with sub-symbolic AI

Engineering Cyber-Physical Swarms
Part II
Enhance the state-of-the-art in aggregate computing to effectively address the complexities in CPSw

Patterns
Set of high-level behaviours which close the gap between AC and CPSW
Chapter 5, 6, 7

Language
Aggregate Computing
Top down global-to-local approach to program self-organising behaviour

Platform
Deployments strategies and execution policies to execute AC scripts
Chapter 9, 10

Sketching
Chapter 12

Field-informed RL
Chapter 13

Tools
Chapter 14

Schedulers
Chapter 11

Roadmap
Chap 10

Background
Part I

Cyber-Physical Swarms
Chapter 1

Macro Programming
Chapter 2

Reinforcement Learning
Chapter 3