

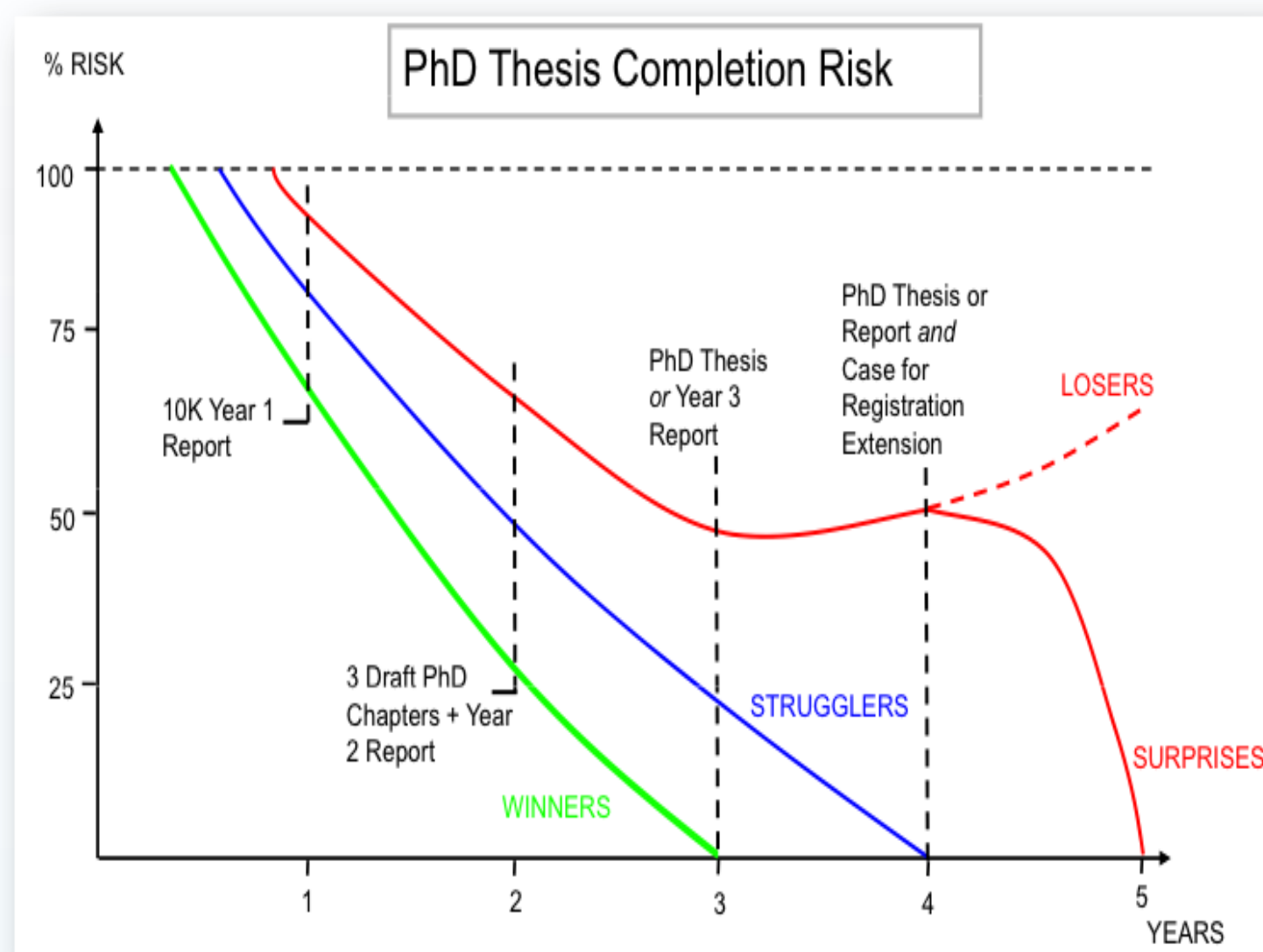
# Adaptive and Compliance Workflow Process Model

Saiful Omar, Computer Science  
Loughborough University  
Email: M.S.Haji-Omar@lboro.ac.uk

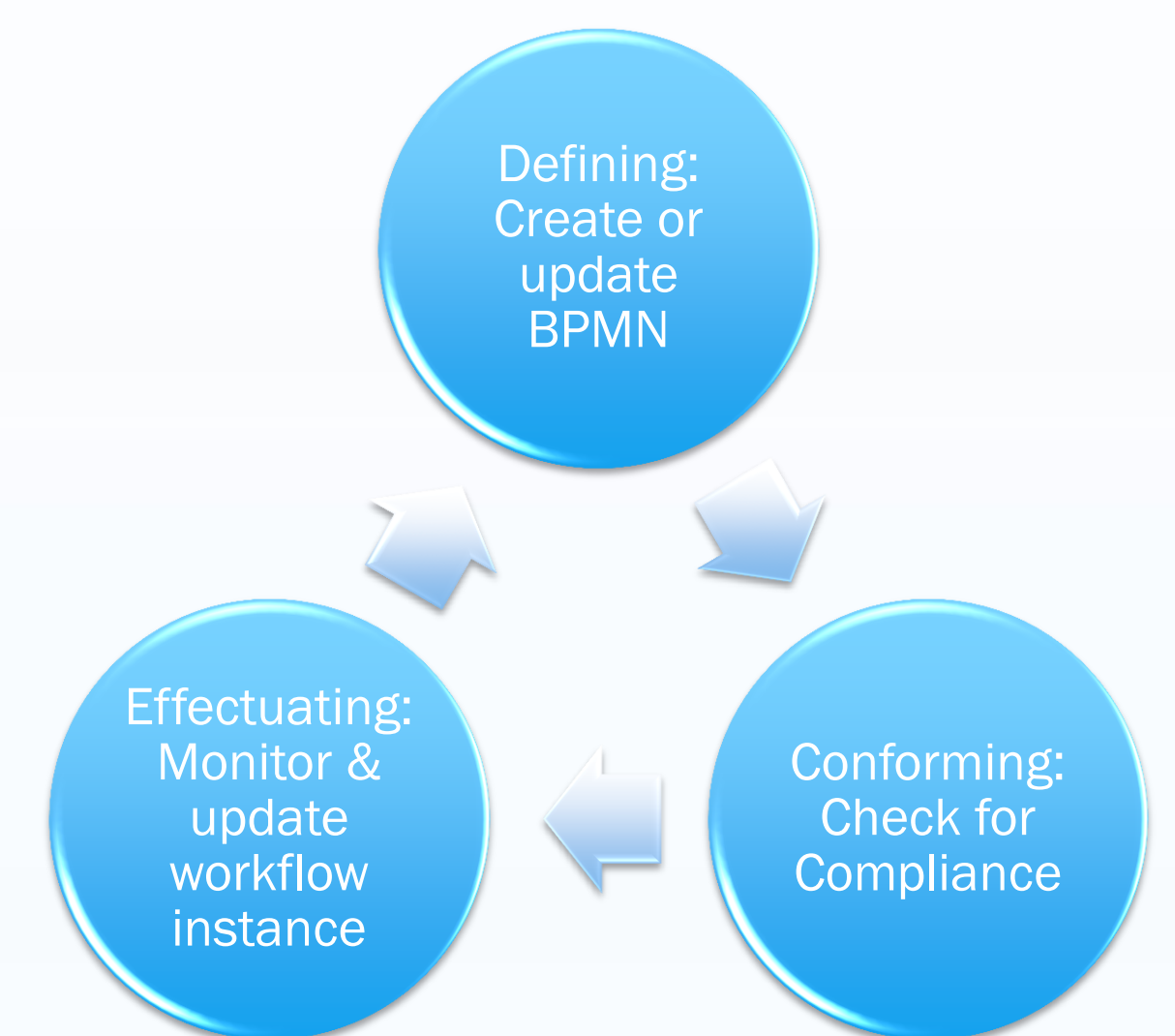
Supervisors:  
Professor Paul Chung  
Dr Christian Dawson

This research aims to investigate and develop novel adaptive and compliance workflow technologies integrating them with a virtual environment to support non-routine workflows that involves social interaction and information sharing.

This study is important in order to help research students to overcome the feeling of isolation, enhance supervision experience and manage their PhD activities. The technology also has the potential of reducing the workload of the supervisors and those involved in the administration of research degrees.



PhD student progression model (adopted from Whalley, 2011)



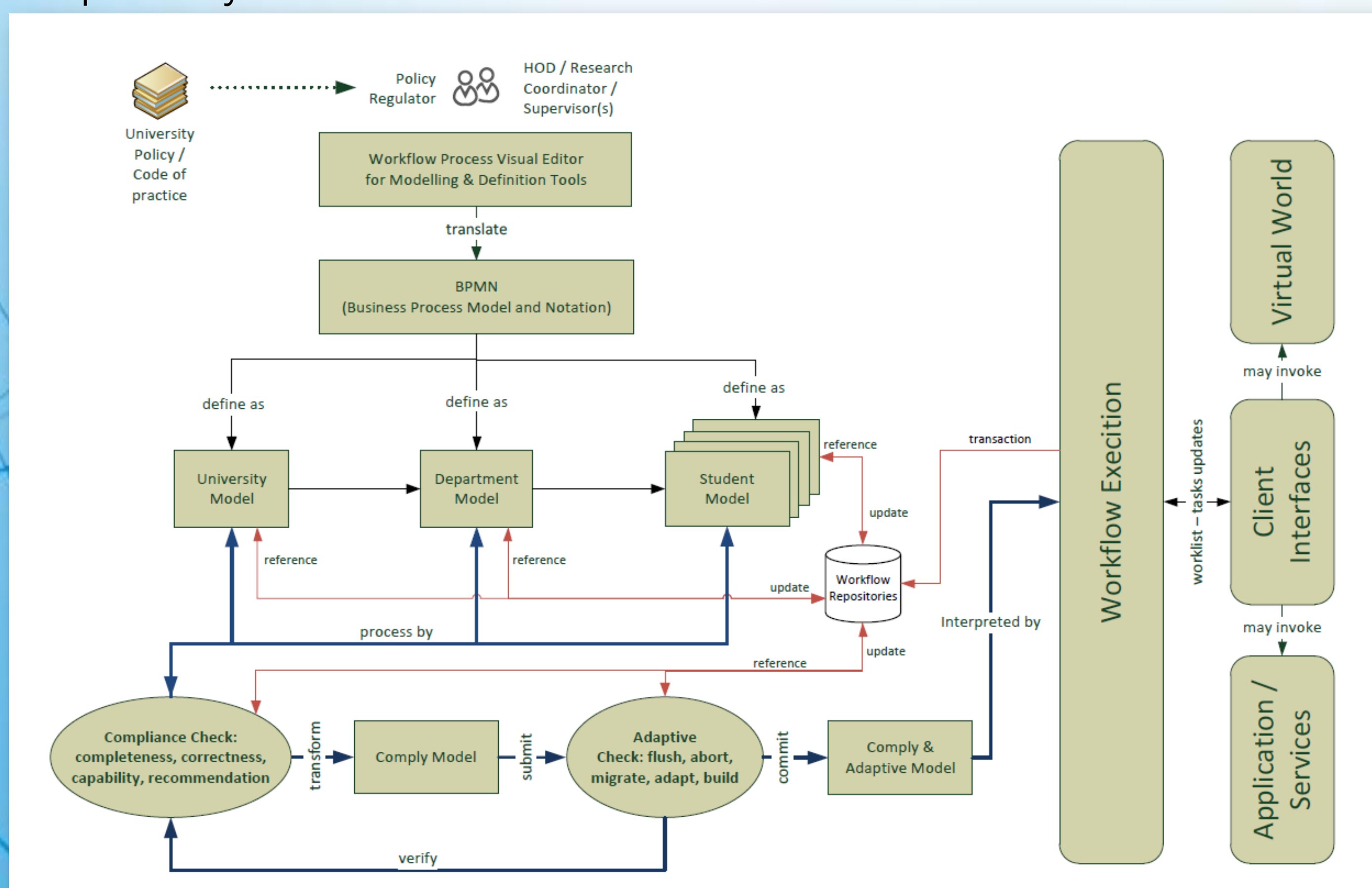
Adaptive & Compliance Workflow Approach

Existing / Proposed Technologies	Elements to support PhD Process			
	Collaboration	Administration	Progression	Supervision
Virtual Research Environment	x	x	x	x
Communication Technologies	✓	x	x	✓
Virtual World (VW)	✓	x	x	✓
Workflow System (WfS)	x	✓	✓	x
Adaptive & Compliance Workflow integrating with Virtual World	✓	✓	✓	✓

WfS is able to satisfy the elements of administration and progression of PhD process. However, existing standard WfS does not support the diverse research process and activities. Furthermore, it is not supported by any automation mechanism to ensure that the specification and execution of the process model are compliant with the policy and regulation or code of practice adopted by any universities.

Preliminary study has shown that communication in VW encourage a larger and faster production of ideas by eliminating superfluous language, it also reduces shyness levels: encouraging even inhibited individuals to input into group discussions. Therefore an integration of VW with adaptive and compliance workflow system is proposed to support the four elements of PhD process.

## Proposed System Architecture



## Preliminary Study: showing the Virtual Environment

Group discussing the appropriate rating to give each poster



In-door virtual poster space

