

**Identifying mechanisms for
developing learning
outcomes as a means of
quality enhancement**

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Outcomes as quality measures

- Defining outcomes on graduation gives quality measure
- Need programme or graduation questionnaire which measures perception of attainment
- If use is to be made of resulting diagnostic information, need to understand mechanism for developing outcome

Rank	Aim	Type
1	Critical intellectual enquiry	cognitive
2	Greater understanding of others	social
3	Critical self-reflection	cognitive
4	Communication	social
5	Collaboration	social
6	Upholding personal & professional ethics	affective
7	Intercultural understanding	social
8	Tackling novel situations & ill-defined problems	cognitive
9	Life-long learning	cognitive
10	Pursuit of academic / professional excellence	cognitive
11	Advocacy for improvement of the human condition	affective
12	Global citizenship	affective
13	Leadership	affective

Students interviewed

Faculty	Number of Disciplines	Number of students interviewed
Arts	6	26
Business & Economics	2	9
Dentistry	1	9
Education	1	6
Law	1	3
Medicine	3	14
Social Sciences	7	23
Total	21	90

Interview topics with typical questions

Adapting from school to university

- How did you write an essay at school? How do you do it now?

Induction to the university

- Did you find orientation (o' camp) activities helpful in adjusting to university life?

Experiential learning

- Have you participated in any kind of experiential learning activities during your study at HKU?

Teaching & learning environment

- What are the forms of teaching adopted in your course?

Analysis 1

The transcripts were then coded according to the 13 elements of the University aims as identified in the HKUSLEQ.

Coding used liberal interpretation of 'related to aim'.

NVivo used for coding.

Sorted file produced for each aim.

Analysis 2

The second level of analysis examined the set of comments aim by aim to identify the mechanism for developing each aim.

Grounded theory.

Collaboration

During our clinical attachment in Year 1 & 2, our tutor would focus on a certain case such as patient bed number 1 had diabetes. We would then divide the work among ourselves with student A doing research on diabetes, student B checking on medicine against diabetes, so forth. After gathering all required info, we would come back and discuss during our tutorial. (Nursing 2)

Intercultural understanding

I live in the hall and we have a lot of exchange students on our floor, knowing them is fun. I was able to understand and see more regarding students from various ethnical backgrounds. As I conversed with them, I got to know more about their culture. (Psychology 3)

I joined the exchange programme in Japan for a year, and therefore had wide exposure to its culture and language. (Japanese Studies 2)

Global citizenship

A good university student should see the world from an international point of view instead of a local view, and have a broad horizon. (Music 2)

A good university student should also pay attention to international news.
(Translations 1)

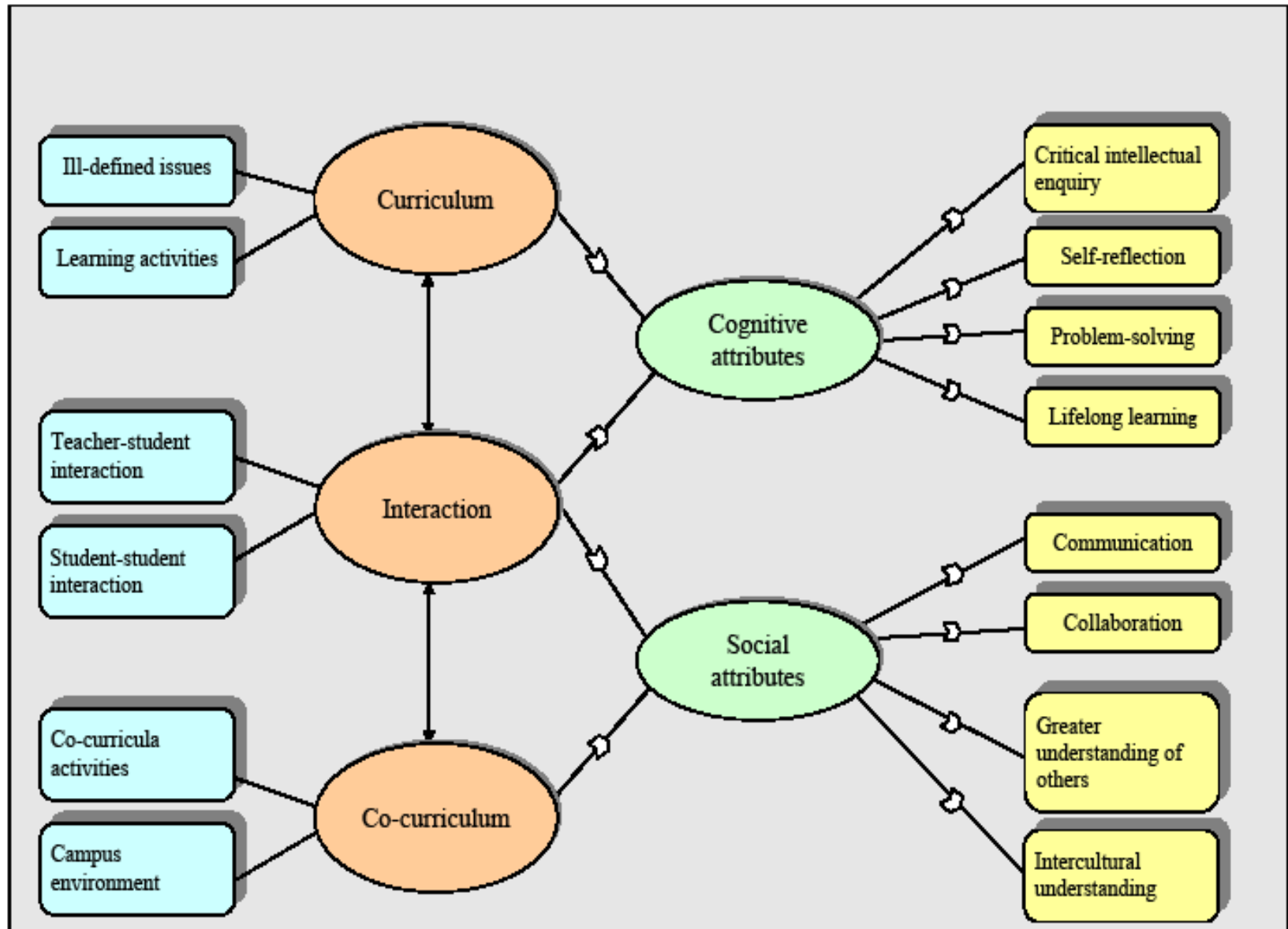
Global citizenship

The programme in HKU aims to broaden the scope of the students with a variety of courses. We have many choices of various European languages including some minor ones, such as Greek, Swedish and Portuguese. We also learn about Europe from the economic, political, cultural and philosophical perspectives. We can analyse European movies from the points of view of social identities or religious beliefs. It is really an interdisciplinary programme. (European Studies 1)

Classification of mechanisms for development of aims

- A Setting subject-independent teaching and learning activities, which provide practice in the use of the aim. (T&L activities)
- B Immersion in a rich campus environment with a diverse student body. Encouraged by co-curricula activities. (co-curricula)
- C Holding a value which may, or may not, have been influenced by the University. (value)
- D Curriculum- or subject-dependent mechanisms applicable to particular disciplines or professional programmes. (subject)
- E Participating in overseas exchange or internship. (exchange)

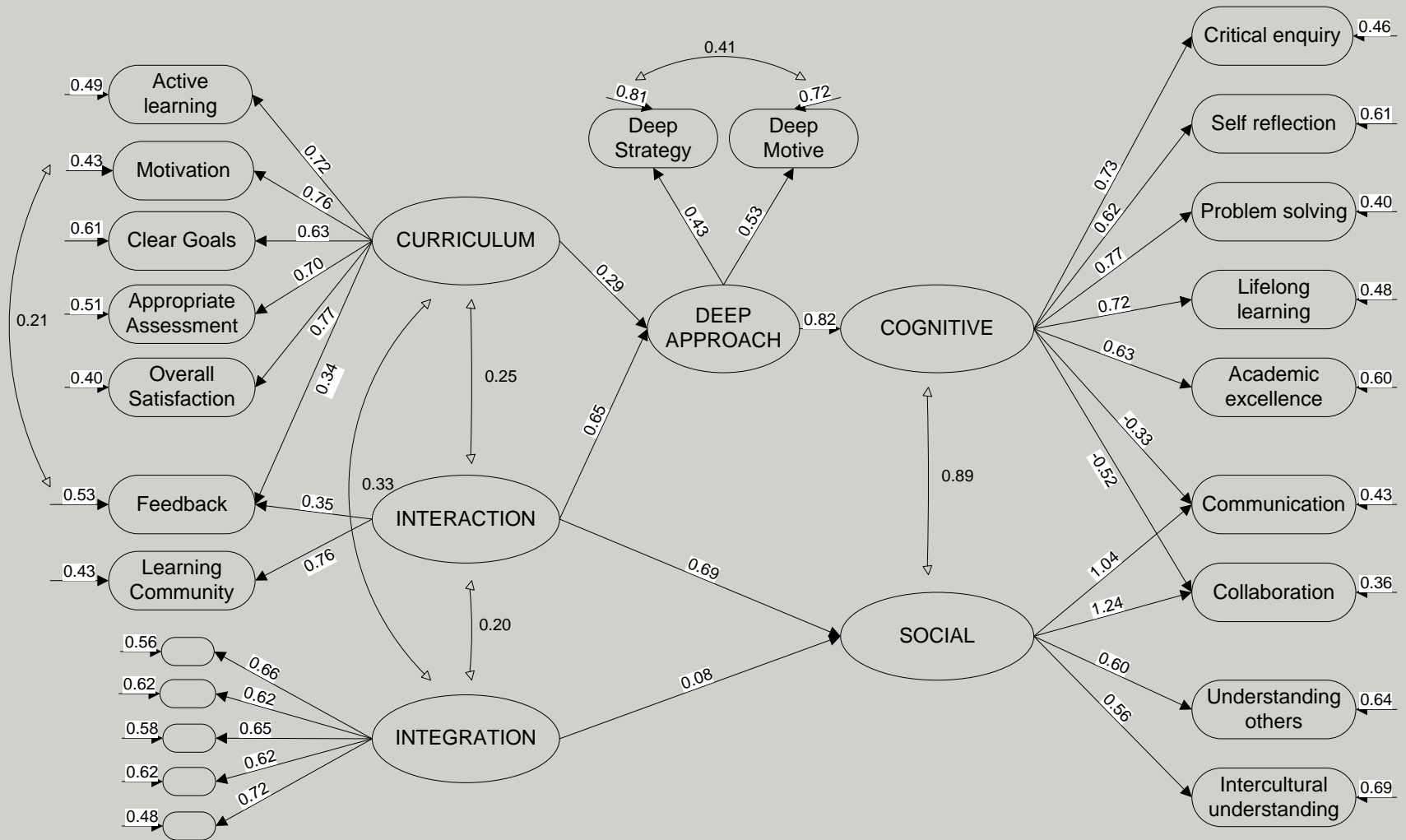
Aim	Mechanism for development				
	T & L activities	Co-curricula	Value	Subject	Exchange
Critical intellectual enquiry	X				
Greater understanding of others		X			
Critical self-reflection	X				
Communication	X				
Collaboration	X	X			
Upholding personal and professional ethics			X	X	
Intercultural understanding		X			X
Tackling novel situations and ill-defined problems	X				
Life-long learning	X				
Pursuit of academic/professional excellence				A	
Advocacy for improvement of the human condition			X	X	
Global citizenship			X	W	?
Leadership		W		W	



Method - SEM

- Respondents of the 2009 HKUSLEQ
- N=2904 (1640 first year, 1264 final year)
- All 10 Faculties
- SEM Estimation: RML

Results - SEM



Results - SEM

- Standardized solutions are shown
- All relationships are significant at 0.05 level
- Model Fit Estimates
 - $\chi^2 = 28385.43$; $df = 217$; $p < 0.05$
 - CFI = 0.98
 - NNFI = 0.97
 - AGFI = 0.92
 - RMSEA = 0.059