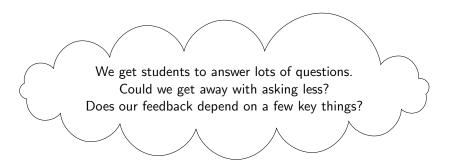
Student feedback: What do students really rate when they fill out questionnaires?

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Motivation



Data investigated

- Student feedback from 2013/14
- Over 2500 responses from 54 modules
- Questionnaires (paper) distributed out in a lecture towards the end of a module
- ▶ 17 statements on (definitely disagree, mostly disagree, neither a/d, mostly agree, definitely agree) scale
- Statements aligned to NSS
- Consider % of students who at least 'agreed'

The questionnaire

Appendix 1 - Cardiff University Module Evaluation

Module Code: XXXXXX Module Title: XXXXXXX



		Definitely Mostly Neither Mostly Definitely Not					
		agree	agree	agree nor disagree	disagree	disagree	applicable
Tea	ching and academic support						
1.	I had a good idea of what to expect from this						
	module.						
2.	The teaching staff were good at explaining things.						
3.	I was able to contact teaching staff when I needed to.						
4.	The module inspired interest and was intellectually stimulating.						
5.	The module met my expectations in terms of the knowledge I have gained.						
6.	I feel confident in communicating the knowledge I have gained on the module.						
7.	The module has helped my personal development by						
	improving my employability skills (e.g. presentation						
	skills, communication skills).						
	sources and learning environment						
8.	The range of the module's resources (on Learning						
	Central and/or in paper form) has effectively						
_	supported my learning.						
9.	Reading materials (books, journals, etc.) for this module were readily accessible.						
10	The teaching rooms used for this module were						
10.	suitable for the style of delivery.						
0.00	sessment						
	I had a clear sense of what is required of me in the						
11	assessment/s for this module.						
12	The criteria used to mark my work were made clear in advance.						
13	Feedback on my marked work was provided within						
-	the specified timeframe.						
	Feedback has helped me to clarify things I did not understand.						
Or	ganisation and management						
15	The module has been well organised.						
16	Any changes in the module or teaching were communicated effectively.						
0	erall satisfaction						
17	Overall, I am satisfied with the quality of this module.						



Initial analysis: response rate

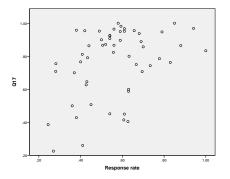


Figure : Overall quality against response rate

Correlation: 0.386

If the missing students did turn up, would the score go up, or down? Linear regression:

 $\mathrm{Q17} \approx 0.5 + 0.5\,\mathrm{Response\,rate}$

But are the missing students likely to be your biggest fans?

Initial analysis: response rate

Response rate had a significant positive correlation with all but two statements on our questionnaire.

There was no significant correlation between response rate and:

- Q12: criteria used to mark my work were made clear in advance
- Q13: feedback on my marked work was provided within the specified timeframe

Overall quality

Statements with highest correlation with overall quality (Q17):

Q1	Good idea what to expect	0.83
Q2	Good at explaining	0.87
Q5	Met my expectation	0.84
Q15	Module well organised	0.91

Factor analysis

- Factor analysis is a statistical method used to describe variability among observed, correlated variables in terms of a potentially lower number of unobserved variables called factors.
- ▶ For example, it is possible that variations in 17 observed variables mainly reflect the variations in three unobserved variables (or factors).

Our findings

- 1. Responses to the 17 questions can be reduced to 3 factors.
- 2. Factors are in decreasing order of importance.
- 3. Items within factors are in decreasing order of importance.

Factor 1

- Q5 met my expectation
 Q17 overall quality
 Q2 lecturer good at explaining
 Q6 improved my confidence in communicating
 Q4 module was inspiring
 Q1 I had a good idea of what to expect
 Q15 module was well organized
- Q16 changes communicated effectively

What this means

1. All these questions are highly correlated.

Q11 I had a clear sense of the assessment

- Not much extra value obtained by asking all of these questions.
- 3. Items within factors are in decreasing order of importance.
- 4. This factor is about expectations and quality.

Factor 2

- Q9 reading materials available
- Q8 range of resources available helped
- Q10 teaching rooms were fine
- Q3 contact staff when I needed

What this means

- 1. All these questions are highly correlated.
- Not much extra value obtained by asking all of these questions.
- 3. Items within factors are in decreasing order of importance.
- 4. This factor is about resources.

Factor 3

- Q13 feedback given in time
- Q14 feedback helped me
- Q12 feedback criteria made available in advance

What this means

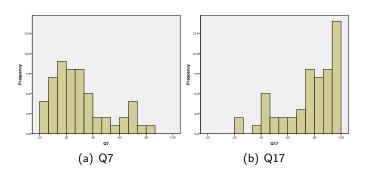
- 1. All these questions are highly correlated.
- 2. Not much extra value obtained by asking all of these questions.
- 3. Items within factors are in decreasing order of importance.
- 4. This factor is about feedback.

Implications

- ▶ 75% of the variation in responses is explained by these three factors.
- ▶ It suggests that you would get nearly as much information by instead of asking agreement for 17 statements, ask something like these instead:
 - 1. Overall, I was satisfied with the quality of the module (Q17 as it stands)
 - 2. Overall, I was satisfied with the resources that were available.
 - 3. Overall, I was satisfied with the feedback that was given to me.

The missing statement...

- ▶ All the statements belonged to at least one factor.
- One statement stood out as 'not belonging' to any of the previous categories.
- Q7: The module has helped my personal development by improving my employability skills.



Thanks for listening! GillardJW@Cardiff.ac.uk, WilsonRH@Cardiff.ac.uk