Different attitudes to 'fate' could affect the success of health messages.

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Are *you* in control of your own health?

More than a quarter of the 14-15 year olds surveyed did not think that they could make much difference to their health.

Can you really make a positive difference to your health, even if you would like to? This assumption lies behind so much health education that a question in the Health Related Behaviour Questionnaire tries to establish people's level of 'health control'.

A person who believes that everything about them is determined by fate is not likely to think that changing their lifestyle will make any difference to their health risk. 'If it's going to get me, it'll get me whatever I do about it.'

Within the questionnaire, this 'fate coefficient' is called the Health Locus of Control. It is based on a scale developed by Wallston *et al.* (1978). We introduced it in Version 12 (1989), so that we now have a decade of data from its use. The four questions used to derive the scale are shown in Figure 1.

Positive responses to *a* and *c*, and negative responses to *b* and *d*, would indicate maximum personal control over health, or an *internal* locus (location) of control. The opposite set of answers would indicate maximum 'helplessness', or an *external* locus of control.

Fig. 1. The Health Locus of Control is derived from the responses to these statements.

How much do you agree or disagree with these statements?

0 = Disagree 1 = Not sure 2 = Agree

10a	**"I am in charge of my health."**	0	1	2
10b	**"If I keep healthy, I've just been lucky."**	0	1	2
10c	**"If I take care of myself I'll stay healthy."**	0	1	2
10d	**"Even if I look after myself I can still easily fall ill."**	0	1	2

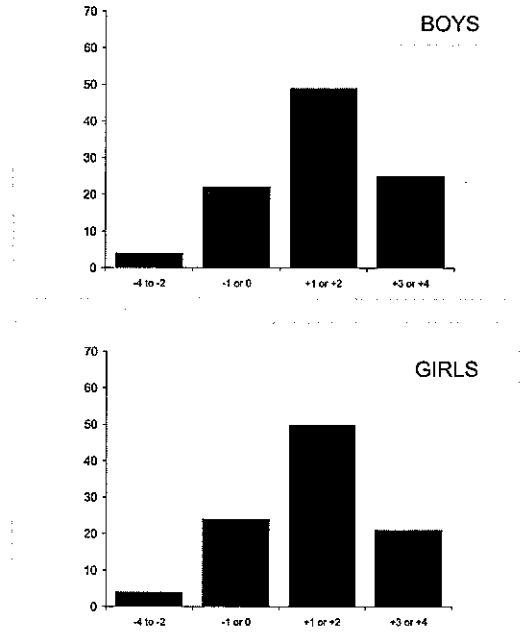


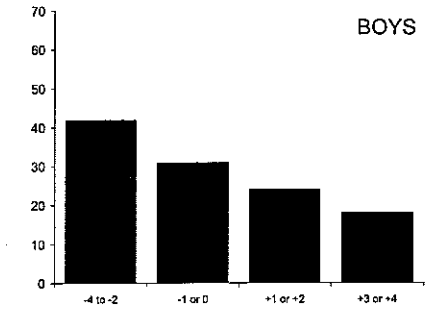
Fig. 2. The HLOC of more than 9000 14-15 year olds in 1997. The third and fourth columns indicate increasing levels of positive (internal) control over their health, as derived from responses to the statements in Fig. 1.

The scores are calculated on a scale from +4 (strongest internal locus) to -4 (strongest external locus). Year 10 data from our 1997 surveys are presented in Fig. 2. They show that the majority fall on the 'internal' (right-hand) side of this particular scale, although the boundary between 'internal' and 'external' depends on how the scale is interpreted.

However, on the face of it, the diagram suggests that more than a quarter of these Year 10 boys and girls do not think that anything they can do will make much difference to their health. Slightly fewer of the girls record the most positive level of control.

HLOC and the fear of being bullied

It is possible to develop a scale that sorts respondents very convincingly into categories, but does not seem to measure anything useful. Compared with the well-established self-esteem scale, which was also derived from a set of responses to statements, the meaning of HLOC was less clear. The accompanying



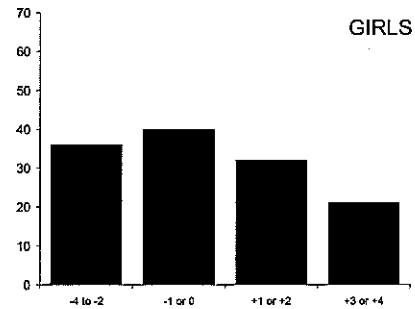


Fig. 3. The percentage of more than 5000 12-13 year olds within each HLOC category that sometimes — or more frequently — feared going to school because of bullying. (1995-6 data)

diagram for Year 8 pupils, which was first published in our *Bully Off* report in 1996, is one particularly convincing piece of evidence that the HLOC scale is indeed measuring something valid.

They registered their fear of being bullied at school on a 4-point scale (*Never, Sometimes, Often, Very often*). The diagram shows those who responded at *Sometimes, Often,* or *Very often*. The link between low HLOC and increased fear of being bullied is clear, and perhaps the notion of 'control' or the lack of it applies not only to their own health but to more visible threats.

HLOC and control over health

We decided to apply our measures of HLOC to two other HRBQ questions that contain a significant element of 'choice'. A question in the diet section asks how often they consider their health when choosing what to eat, and in the drugs section the respondents are asked if they want to give up smoking.

Table 1. The percentage of more than 9000 14-15 year olds within each HLOC category with respect to healthy food choices and smoking. (1997 data)

HLOC	-4 to -2		-1 to 0		+1 to +2		+3 to +4	
	B	*G*	*B*	*G*	*B*	*G*	*B*	*G*
Healthy food choices?								
Never	34	20	29	15	23	10	17	6
Sometimes	48	40	45	50	47	47	45	38
Quite often	12	22	16	21	19	25	22	28
Very often	3	12	5	9	8	12	11	19
Always	3	6	5	5	4	7	5	9
	100	100	100	100	100	100	100	100
Kind of smoker								
Never smoked	29	27	34	27	38	35	42	40
Tried	21	16	25	20	29	25	27	27
Given up	14	14	11	12	9	11	10	10
Occasionally	7	11	7	12	8	10	9	11
Like to stop	23	23	15	20	12	14	9	8
Don't want to stop	6	10	9	10	4	6	3	4
	100	100	100	100	100	100	100	100
All current smokers	36	44	31	42	24	30	21	23

Healthy dietary choices

Table 1 shows the percentage within each HLOC group that give dietary health considerations different priorities. The highest percentage values for each gender in each row are underlined, and the trend from upper left to lower right suggests that those with a higher (more internal) value of HLOC are likely to exercise healthy choices more frequently.

Hidden inside these data are some other considerations.

- How much practical opportunity do young people have to make healthy dietary choices, whether at home or at school?
- We note that more girls than boys say they take health into account when choosing what to eat, but boys tend to have a higher value of HLOC.

Decisions about smoking

There is a less tidy trend across this second group in Table 1, partly because the categories follow a less logical pattern. However, *Never smoked* and *Like to stop* show a clear relationship with HLOC. The highest HLOC category contains the greatest percentage that never smoked, and the lowest category contains the greatest percentage that would like to stop, as well as the greatest percentage of current smokers.

These data argue strongly against an approach to health education that emphasises only the risks to health of certain behaviours. The pupil who feels that they may well fall ill despite all care is unlikely to be motivated by greater awareness of health risks until they feel that their health is more under their control. In

fact, emphasising risks may serve only to enhance their feelings of powerlessness.

The 'like to stop' group of smokers is particularly interesting, because they form an obvious target for smoking-cessation work. The question to be asked is: *What is stopping them from stopping?*

Grouping people by HLOC

Matching groups according to their HLOC did produce benefits within a weight-loss programme.

Studies have been carried out to investigate the role of HLOC in a variety of health-related behaviours. Wallston & Wallston (1978) reviewed evidence supporting its relevance to contraceptive usage, the effectiveness of weight-loss programmes, and willingness to seek information and advice about medica problems.

The same authors reported that matchin groups according to their HLOC did produc benefits within a weight-loss programme. Peo ple with an internal HLOC received instructior around self-control, determination, and per sonal achievement, while those with an external HLOC had sessions with an emphasis on group support, expert advice and so on, and they did better than others who were not matched in this way. Could the same strategies be applied to smoking cessation groups?

Conclusion

What is the relevance of HLOC to work with young people?

Pupils' views about the controllability of health may be less optimistic than that of the educator.

Even if a young person does feel that health is not just a matter of chance, there has to be a realistic balance between the disadvantages of (for example) giving up smoking, and any likely long-term benefit.

Health risk factors such as pollution, poverty, discrimination, and stress levels, which may in practice be unalterable, will affect potential for behaviour change.

The Government's green paper *Our Healthier Nation* is a welcome step towards recognising the social and structural determinants of health risks, rather than placing the onus solely on the individual to do something about it.

Health educators need to recognise that personal behaviour has a limited role in affecting health risks, and that other people's views about the controllability of personal health may be much less optimistic than their own.

References

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