

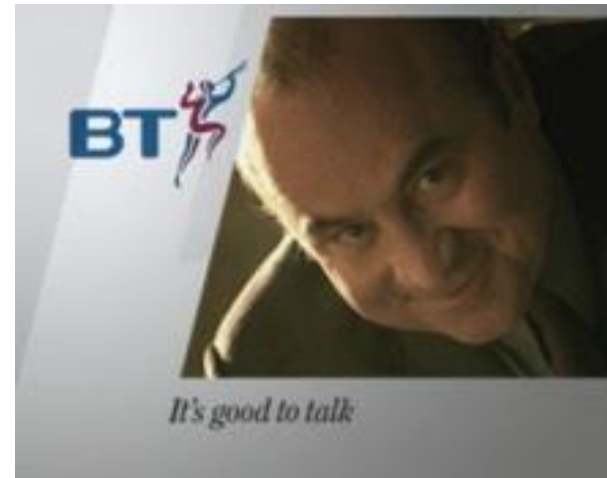


'It's good to talk'
Why?
**What do we already know about
learning in classrooms?**

Professor Viv Ellis

25 years and counting ...

<https://www.youtube.com/watch?v=Jtyn1jJajl>



40 years and counting

- Language and learning
- From communication to curriculum
- Exploratory talk, dialogue, inter-thinking
- Challenging the IRF or IRE sequence
 - Creating space for pupil language
- The functions of language ('adult' functions)
- Thought and language/thinking and speech
 - James Britton, Douglas Barnes, Mary Budd Rowe, M.A.K. Halliday, Robin Alexander, Martin Nystrand, Neil Mercer, Sarah Michaels, etc etc
 - Lev Vygotsky, Mikhail Bakhtin

e.g. Dialogic teaching

- the different contexts of talk – whole class, collective (teacher-led) group, collaborative (pupil-led) group, individual;
- the **purpose of questions** (e.g. elicitation, recall, instruction, management, routine, probing) and their structure (e.g. **closed, open**, directive, leading, narrow, discursive);
- the form of answers (e.g. factual, analytical, **speculative, hypothesising**, evaluative) and their length;
- **the feedback which answers receive** (e.g. evaluative, motivational, diagnostic, neutral);
- **the way answers are built upon in order to take thinking forward**;
- the length of exchanges;
- roles and procedures for pupil-pupil discussion;
- classroom climate and relationships;
- classroom organisation and layout;
- lesson planning and structure;
- the teacher subject knowledge needed for extended exchanges;
- ground rules governing the effective conduct of dialogic talk in classroom settings (attending, listening, speaking loudly and clearly, respecting alternative viewpoints etc).

(Alexander 2003)

The bit of Vygotsky that can get lost

The social dimension of **concept formation**

Scientific and Spontaneous Concepts

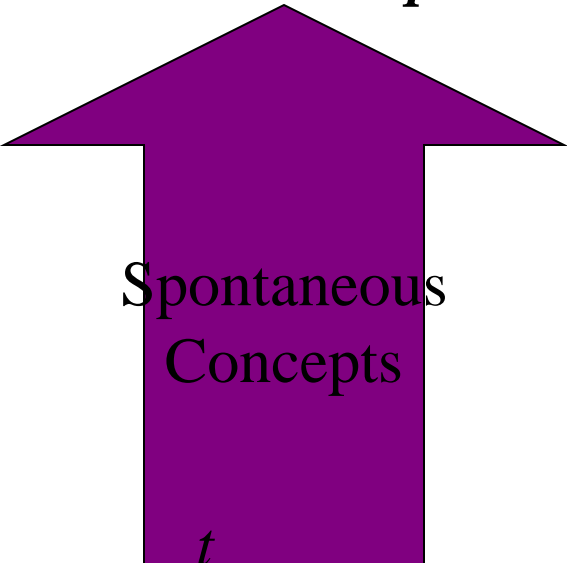
- Impose on child logically defined concepts
- Scientific concepts move 'downwards' towards greater concreteness
- Evolve in highly structured and specialized activity of classroom instruction



Scientific
Concepts

Mature concepts

- Concepts emerge from the child's own reflections of everyday experience
- Spontaneous concepts move upwards towards greater abstractness
- Develops in the child's everyday learning environment



Spontaneous
Concepts

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However ...

Young children's concept development

- May not be conceptual (whether from a Piagetian or Vygotskian perspective)
- May not be about moving from concrete to abstract but between two sets of discursive practices based on 'problems of practical and material necessity rather than problems of symbolic control' (Walkerdine 1985, 1989)
- But also when the context is familiar, young children may certainly be capable of drawing inferences that are conceptual (Donaldson 1978)

Pleasurable symbolic play

- The imaginative situation, the defining characteristic of symbolic play, makes 'play a means of developing abstract thought' and therefore 'a leading factor in development' (Vygotsky 1978)
- Language and thinking are 'generated by the power and pleasure children have in mastering the art of story' (Fox 1989)

'There's ten witches all around our country
There's ten witches in our country
Oh God there's another three in our country so
we'll have to kill thirteen now'

- Joshua story 55 (5:9)

- Story as a means of understanding physical, spatial and temporal concepts
- As mathematical learning develops, the expectation is that the metaphorical cloak is stripped away to focus on the underlying concepts and this is what children find difficulty with (Walkerdine 1982)
- How can affectivity, narrative, imagination and symbolic play be harnessed to enhance mathematical learning?

‘Whereas adults differentiate their thought with specialised kinds of discourse such as narrative, generalisation and theory, children must, for a long time, make narrative do for all’ (Moffett 1968)

Talking Maths Talk

What varieties of talk support and enhance young children's mathematical learning?

Is one variety more 'effective' than another? (or is that the wrong question?)

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