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YOUTHS' ENCOUNTER WITH THE HUMAN JOURNEY

A study of learning in an exhibition of the
Swedish Museum of Natural History

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Geenf 10 ANOS, São Paulo, December 2012





Analytical approach

- a pragmatic perspective

- First, a description of learning. Learning treated on a discursive level as a description of what student say and do as a part of an activity (Wickman, 2004; Wickman & Östman, 2002).
 - **Encounters** with the exhibit, instructions, etc.
 - **Gaps** that are noticed by students.
 - **Relations** make encounters intelligible
- Second, an analysis of the significance of the encounters and relations for students' learning.



- Yes, what are the similarities and differences... especially... *Social*.

- Were they in tribes, or were they lone wolves, or in packs?

- I guess that it is a woman and a man.

- It is a big difference between sexes.

- *We don't go into that...*

- Genetic defects... but he looks like masculine. He has a beard.

- She looks like feminine. It seems to be large difference between sexes.

- And in size too...or may be it is just a child.

- Hard to say if they are young or old, because they are wrinkly.

- She is a child. Or teenager, may be. I believe she is older.

- They still are gorilla-like, no really humans.

- Very similar to chimpanzees in the face, with those eyebrows...

Gap

Relations

Analysis

- The students, in the encounter with the instructions and the exhibit, noticed gaps (social issues and sexual dimorphism).
- The first gap is difficult to fill, it lingers.
- The second gap is filled by relations to observations, previous experiences and knowledge.

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Social

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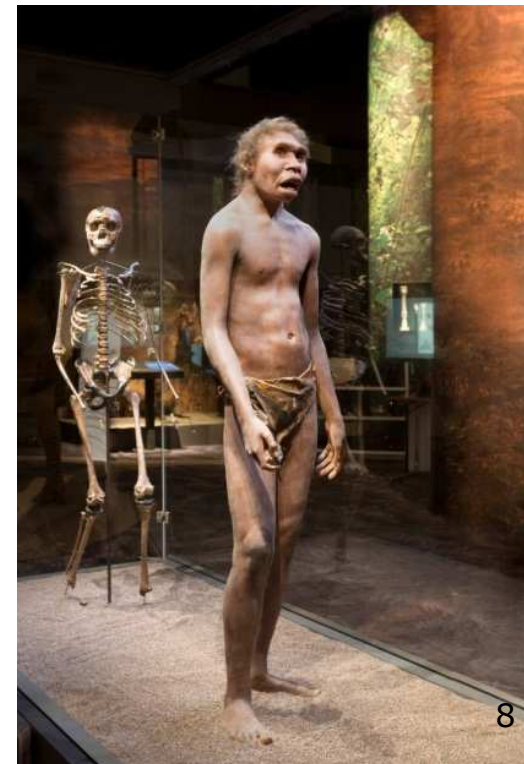
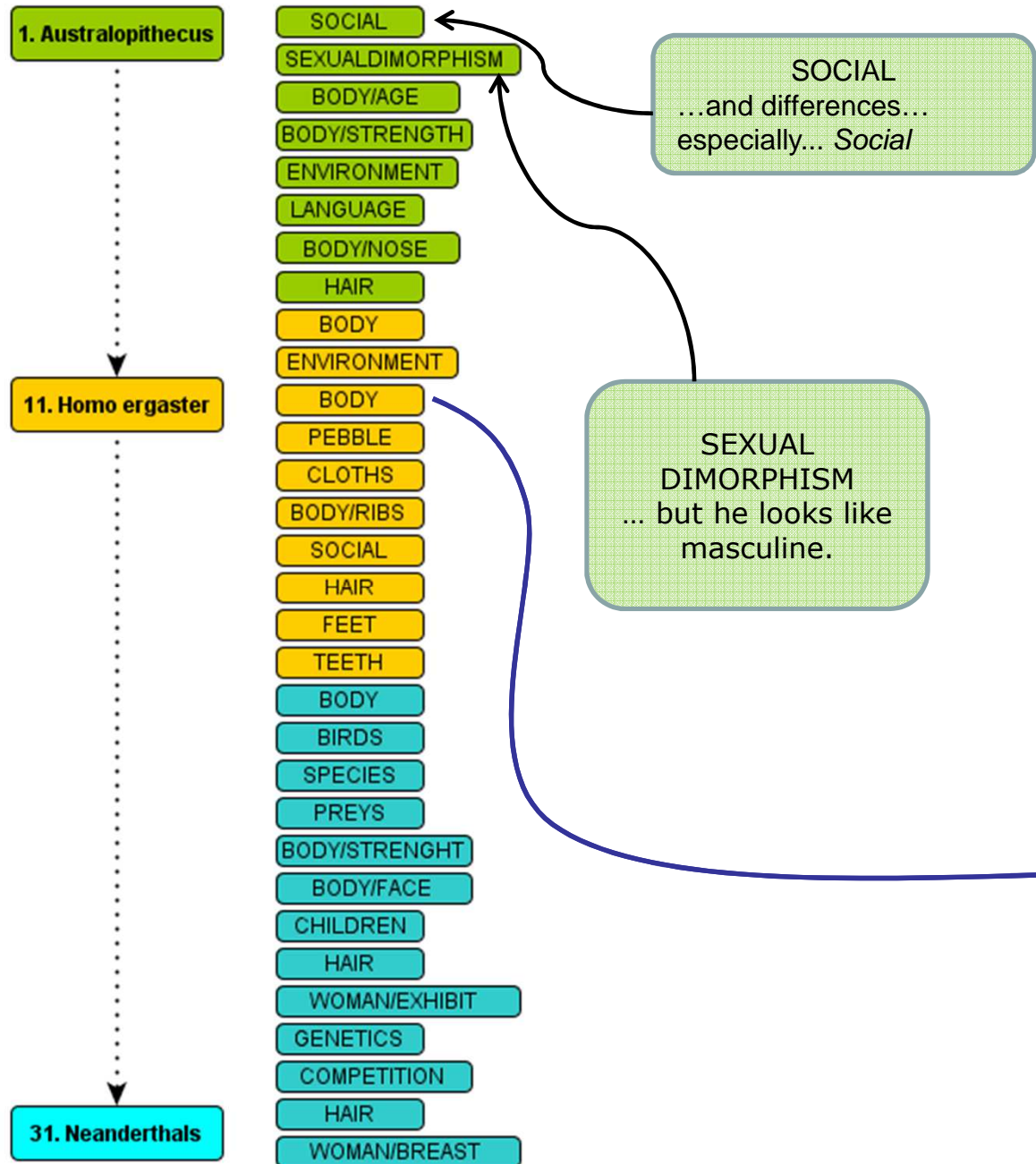
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Sexual dimorphism

- They still are gorilla-like, no really humans.

- Very similar to chimpanzees in the face, with those eyebrows...



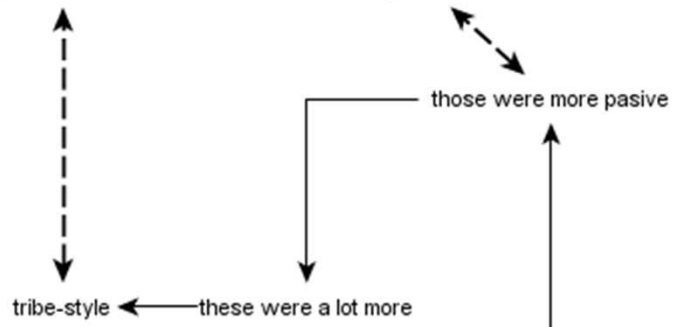
1. Australopithecus

11. Homo ergaster

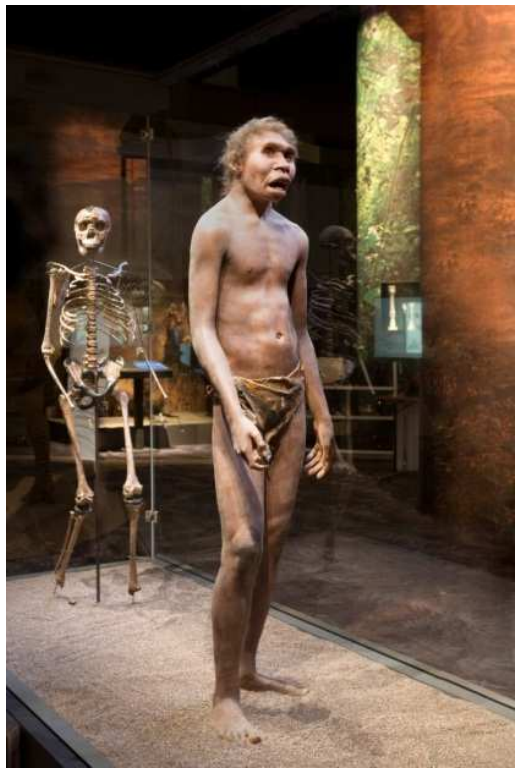
31. Neanderthals

- SOCIAL
- SEXUALDIMORPHISM
- BODY/AGE
- BODY/STRENGTH
- ENVIRONMENT
- LANGUAGE
- BODY/NOSE
- HAIR
- BODY
- ENVIRONMENT
- BODY
- PEBBLE
- CLOTHS
- BODY/RIBS
- SOCIAL
- HAIR
- FEET
- TEETH
- BODY
- BIRDS
- SPECIES
- PREYS
- BODY/STRENGHT
- BODY/FACE
- CHILDREN
- HAIR
- WOMAN/EXHIBIT
- GENETICS
- COMPETITION
- HAIR
- WOMAN/BREAST

were they tribes or lone wolves? live in the same place or went around?



slenderer → we became more mobile → huntsman → run-after-style
pebbel or flint?



Analysis

- The students found relations to explain different aspects of the body of the Turkana boy, grounded in observations and previous knowledge.
- These relations help them to fill a previous gap about the social structure of the Australopithecus. They make connections between parts of the exhibition.

Some preliminary conclusions

- The activity represents an opportunity of learning. Starting with students' questions help them to make meaning of the exhibition.
- The students establish relations to own body experiences, social aspects, language, culture and personal relationships to make encounters intelligible. *The exhibition touch your heart!*
- Students are healthy critical: *How do they know?*

... conclusions

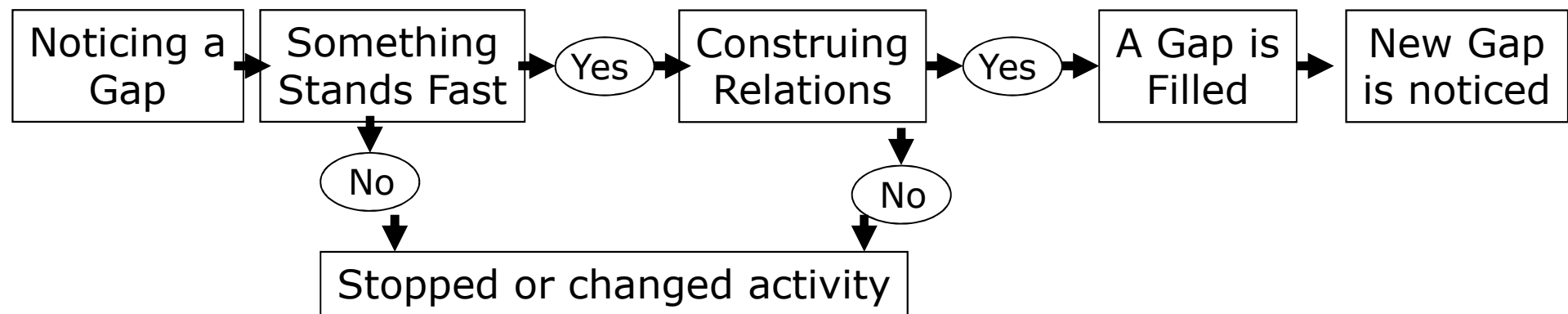
- There are aspects of the reconstructions that are problematic, i. e. hair.
- The process of evolution is difficult to grasp in the exhibition. It is necessary a discussion of the process behind the development of human characters (i. e. sexual dimorphism) and development and extinction of the different species.



(Susanna Edvall, Museum Educator with at group of student teachers)

Muito obrigado!

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- **Learning proceeds as people continuously notice gaps and are filling them with relations to what stands fast in encounters.**
- **A language game with a purpose.**

What is knowledge? and How do we get it? – a pragmatic perspective

- We adopt an antirepresentational account of knowledge, i.e., an account “which does not view knowledge as a matter of getting reality right, but as a matter of acquiring habits of action for coping with reality” (Rorty, 1991).
- Actions include not only what we do but also what we say as participants of practices.

What knowledge do the students deal with?

- The epistemological question of this study concerns students' ways of coping with the activity in the exhibition. These actions represent their *practical epistemologies*, i.e., what *they* count as knowledge and how *they* get knowledge *as acting participants* in the educational practice. This implies that practical epistemologies are descriptions of people's ways of making meaning in action. Some of these actions may represent habits of coping with laboratory work or classroom work more generally. Hence, in a wider sense the practical epistemologies the students use may amount to the learning approaches and ways of making meaning that laboratory work fosters (cf. Wickman, 2004).

Learning situated and discursive

- occurs in unique situations situated in a shared cultural or institutional context that gives words and actions meaning (cf. Lave & Wenger, 1991).
- Since language as well as most norms and values are socially shared, learning is essentially sociocultural and discursive.

Learning in our analysis

- An important aspect of this analysis is that it is not restricted to cognition.
- Learning thus cannot be reduced to reception of data, which are tested against theoretical conceptual constructs.
- Dewey (1934/1980). Experiencing always involves both “doing and undergoing.” Undergoing (transformation of experiences, learning) requires doing (action), which necessarily also involves values and norms to decide what are relevant and irrelevant experiences in a situation and what are right and wrong ways to proceed. (*We don't go into that...*)



Wittgenstein's language-game (1969)

- Wittgenstein showed how language is part of activities like traveling on a bus, or for that matter doing science. We learn the words of the language while participating in such social activities. We learn what a chair is through communication and language use in a diverse number of social activities where chairs are needed.
- The basic level is to use the words in social activities that have certain purposes
- In this way concepts are not primarily readymade entities in the structures of science or our brains, but situated in the flow and activities of life.

References

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- Rorty, R. (1991). Objectivity, relativism, and truth. Philosophical papers (Vol. I). Cambridge, England, UK: Cambridge University Press.
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- Wittgenstein, L. (1969). On certainty. Oxford, UK: Blackwell.