

Crossing the school-work boundary

Internationale Conferentie: 100% leren voor een plek op de arbeidsmarkt. Over de samenwerking tussen school en leerbedrijf. *29 September 2015*

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Binary thinking

The classic divide in vocational education

School



Work



Fragmented education



Peer learning



Labs/Simulations



Frontal instruction



Workplace learning



Learning teams



Self-study

Thinking in opposites

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www.instructables.com

However,

Economists

‘Working and learning are becoming less divided’

(‘Towards a learning economy. Investing in the earning capacity of the Netherlands’, 2013. The Netherlands Scientific Council for Government Policy (WRR). WRR-report no. 90)

Scientists

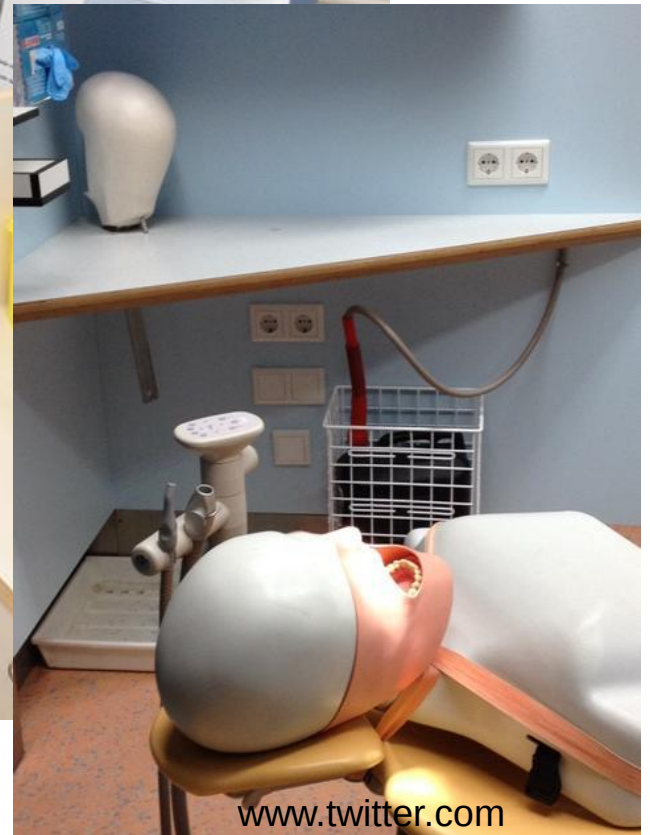
'It is important to realize that paradoxes are only seemingly contradictory. There is a contradiction from a certain perspective only, not from other perspectives. Therefore, paradoxical thinking fits well into constructivism: it focuses thinking on the perspectives of actors in their environments and how these restrict their thinking. In changing our perspective or mental model, paradoxical contradictions may be overcome. We may find ways to reconcile the seemingly irreconcilable tensions' (p. 597).

Simons, P.R.J. (1999). Transfer of learning: paradoxes for learners. *International Journal of Educational Research* 31, 577-589.

Clinic at school - dental hygienist



www.hu.nl

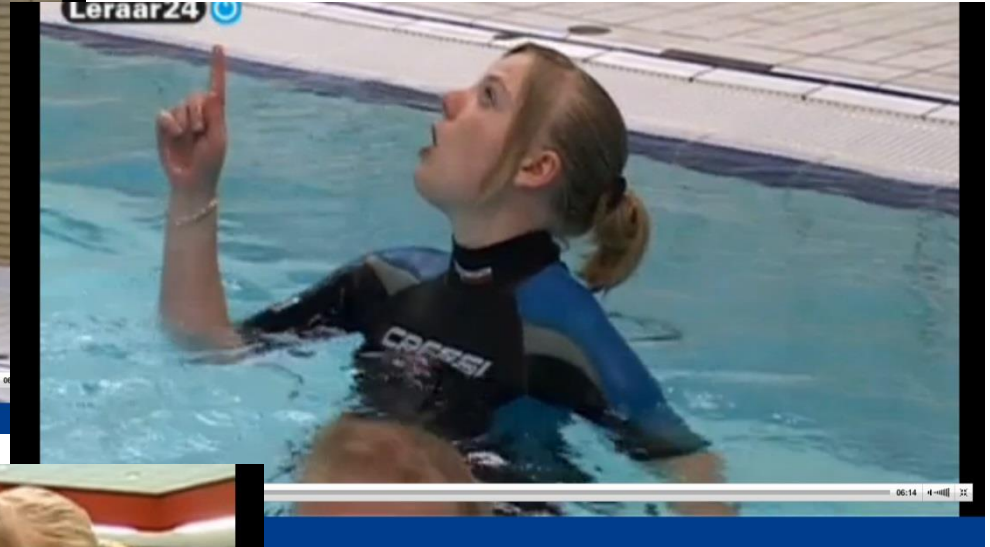


www.twitter.com

Restaurants at school



Workplace learning – swim teacher



<https://www.leraar24.nl/video/1801/leerbedrijf-sportstad-hybride-onderwijs>

Gastronomix in work & school



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COMPONENTEN

COMPOSITIES

Hier kun je zoeken naar specifieke componenten en composities...

Zoeken



Inloggen

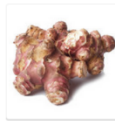
↓ COMPONENTEN (2152)

Componenten zijn onderdelen waaruit een compositie (of gerecht) wordt opgebouwd. De componenten worden altijd gemaakt met één primair hoofdingrediënt.

Ingridiënten

Basisrecepten






WORD NU LID

Leden hebben toegang tot ruim **2.050** componenten en alle voorgaande composities, verzamelen favoriete componenten en creëren composities in **MyGSX**. Mogen meedoen aan de **Challenge**, kunnen recepten **printen** en nog veel meer!

Lid worden

Ben je al lid? [Inloggen](#)

LAATSTE COMPONENTEN




Overcoming the divide

Boundaries?

- 'All learning involves boundaries'
- 'Boundaries are becoming more explicit because of increasing specialization; people, therefore, search for ways to connect and mobilize themselves across social and cultural practices to avoid fragmentation' (Akkerman & Bakker, 2011)
- Boundaries, for example:
  - School – work
  - Formal – informal/social system
  - Certified – unqualified

Boundary crossing (Akkerman & Bakker, 2011)



- **Identification:** questioning the core identity, leading to renewed insight of diverse practices
- **Coordination:** means and procedures to allow diverse practices to cooperate efficiently
- **Reflection:** realize and explicate differences between practices and learn something new
- **Transformation:** Hybridization (like in the earlier examples)

Model to cross school- work boundary

Hybrid VET curriculum

- Bring work into school:
  - Authentic assignments
  - 'Whole task' approach
  - Computer-based simulations
  - Workplace simulations (WPS)
  - Real-life projects
  - In school enterprises
- Bring school into work:
  - Workplace learning
  - Workplace curriculum
  - Industry-School-Partnerships (ISP)

Acquisition

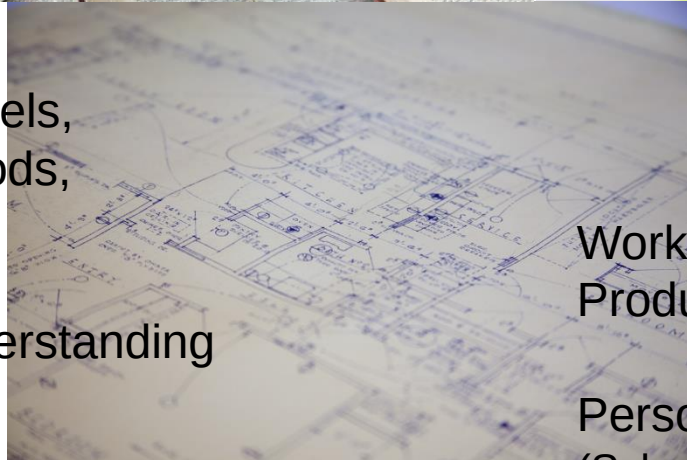
Formal, technical knowledge
Explicit knowledge
Expertise



Theory

Theoretical models,
concepts, methods,
procedures

Conceptual understanding



Work process knowledge
Product knowledge

Personal Professional Theory
(Schaap, Baartman & De Bruijn, 2012)

Participation



Google Images

Dimension: learning processes

Acquisition

Theory

Understanding Concepts

Explicit knowledge

Work process knowledge

Becoming part of a 'community of practice'

Competent professional

Knowing, implicit knowledge

Participation

Cultivation under different conditions



Controlled & save

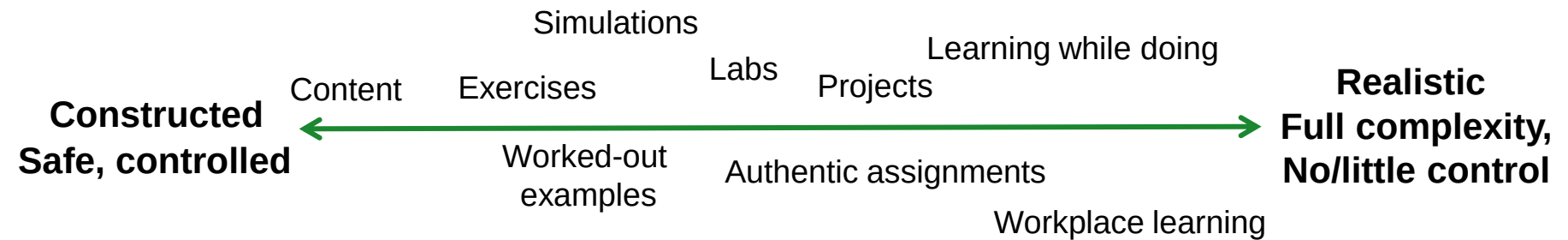


Controlled & outside

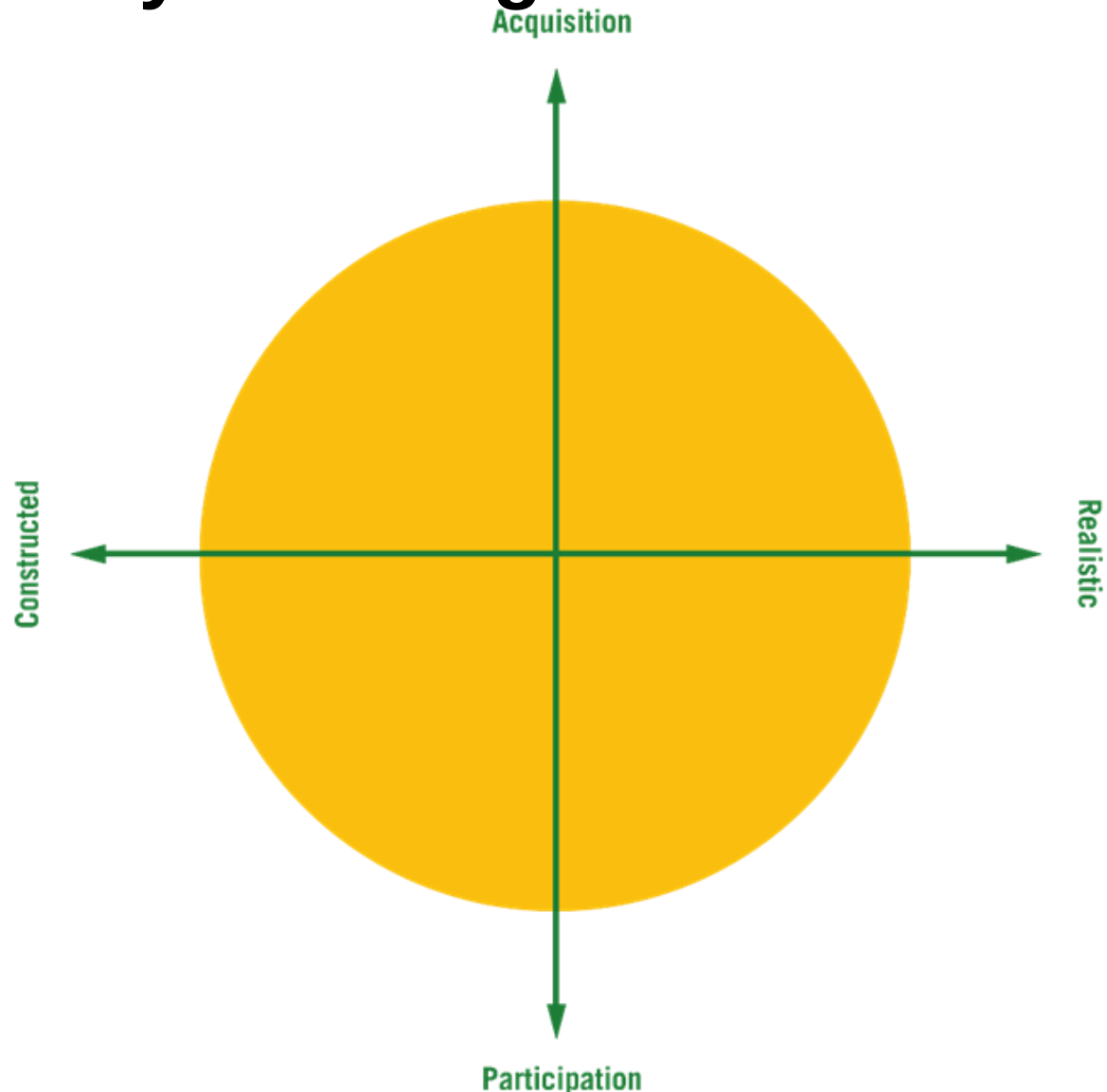


Out there in the wild....

Dimension: conditions

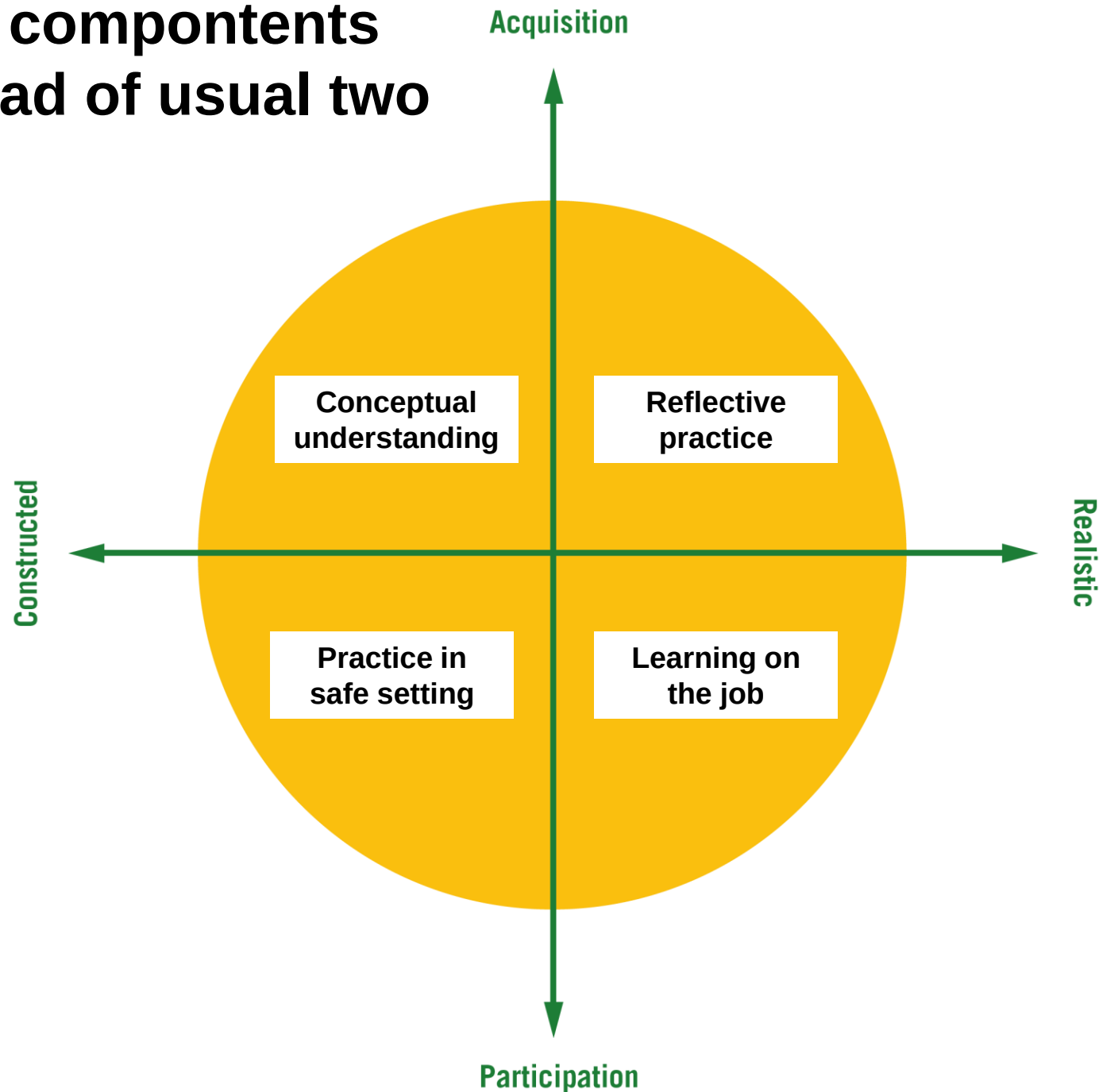


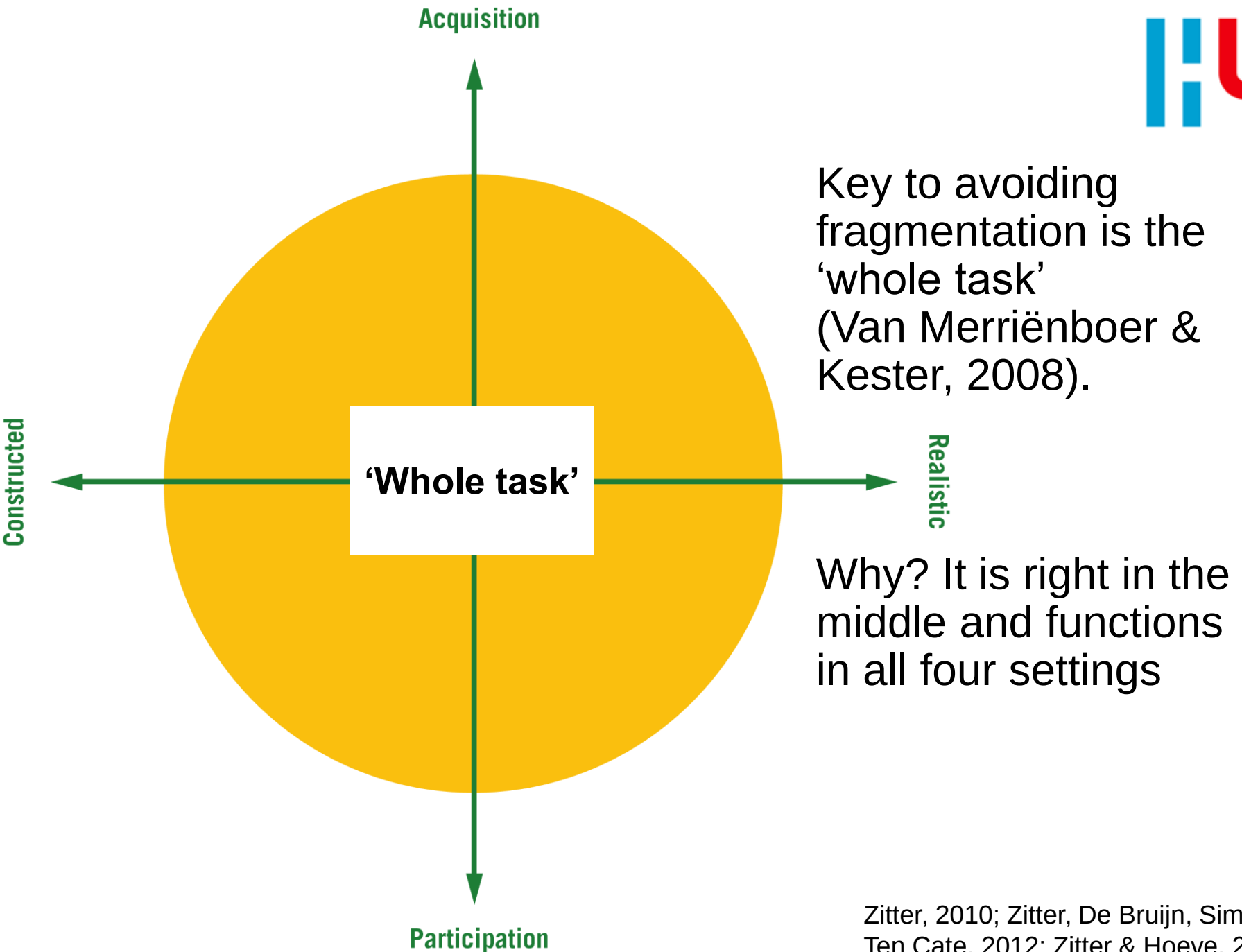
Boundary crossing model



(Zitter, 2010; Zitter, De Bruijn, Simons & Ten Cate, 2012; Zitter & Hoeve, 2012)

Four components instead of usual two





Examples boundary objects media design



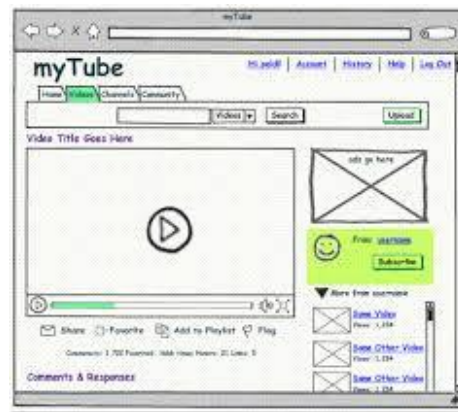
MoodBoard



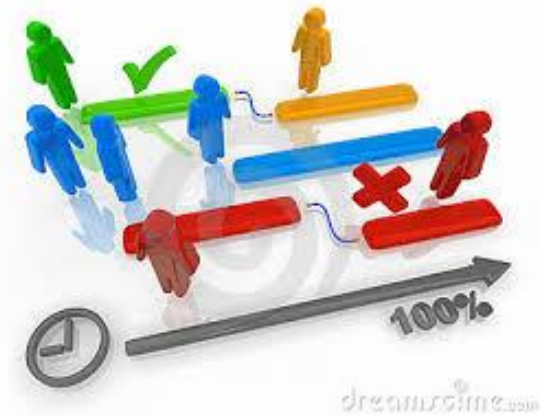
Market research



WireFrame



Mock-up

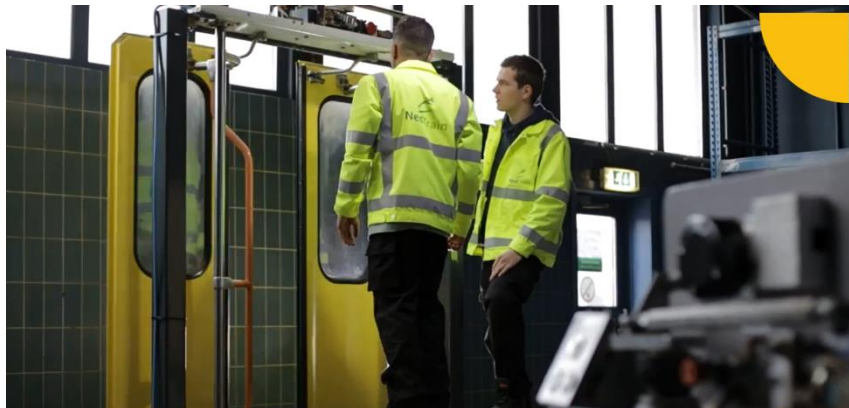


Project plan



Website

Innovative hybrid learning environment Dutch Railways



90% certificate and contract to work for Dutch railways

Mind the gap.....

- Students experience boundaries
  - Be aware of these boundaries
  - Take positive perspective: learning potential of boundaries
-
- Design for boundary crossing!

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