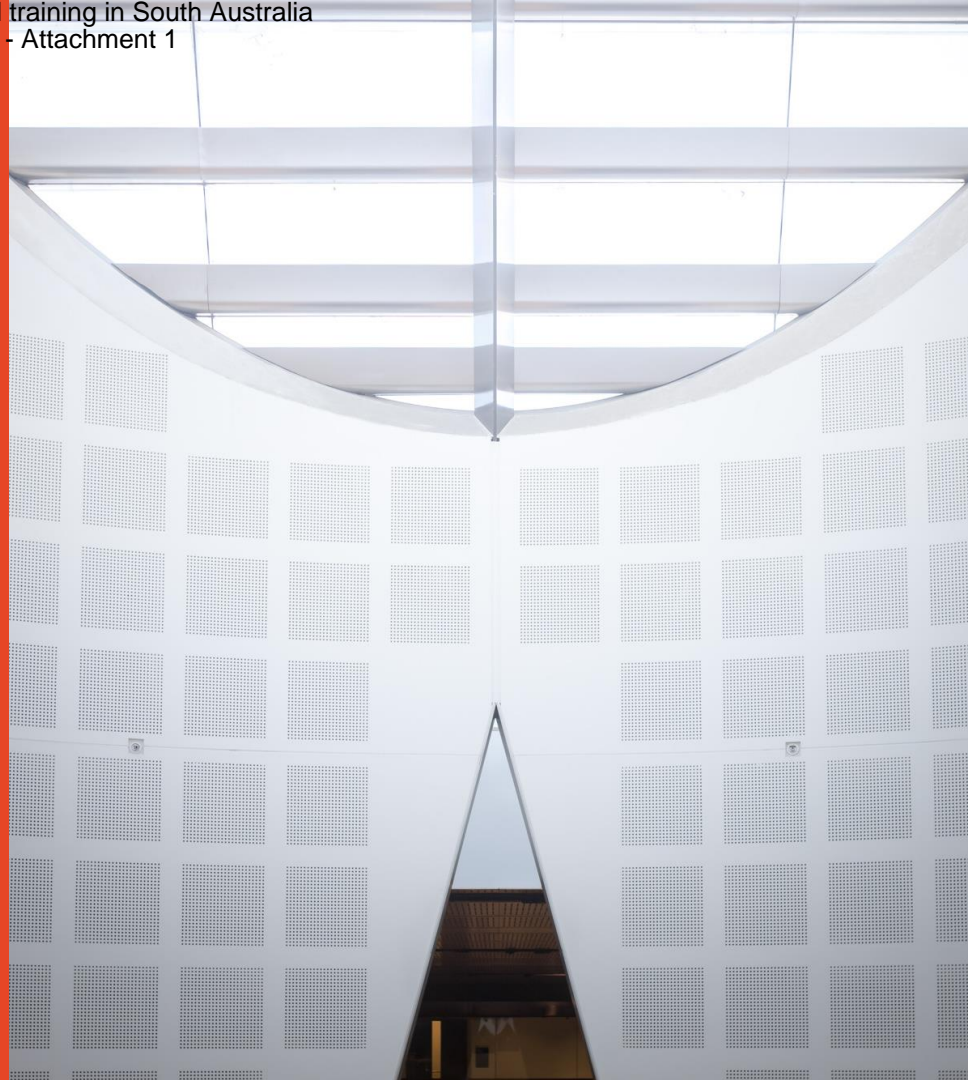


From VET to Vocational Education – ‘Saving TAFE’ vs TAFE as anchor for economic and social renewal

**Professor John Buchanan
Business Analytics,
Business School**



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The key ideas

The greatest power a sovereign can have is to define the terms of debate.

Thomas Hobbes

The formulation of a problem is often more essential than its solution...

Albert Einstein + Leopold Infeld

Overview

1. The problems
2. Getting the questions right
3. Next steps

Conclusion

- The choice: VET crisis management or renewal of vocational education?
- TAFE: recipient of 'community service obligation' funding or anchor to quality vocational education?

1 The problems

- Current system failing on its own terms (COAG)
- Quality (financial scandals, critical not isolated incidents)
- Relevance (huge level of VET in agricultural, no change in educational attainment)

1. Problem (a) – system failing on own terms (COAG)

| | | | |
|--|------------------------------|------------------------------|---------------------|
| Benchmark: Halve Australians without quals at Cert III + above 2009 – 2020 | 47.1 % (2009) | 42.5% (2014) | Not on track |
| Benchmark: Double higher level qual completions (Dips + Advanced Dips) 2009 – 2020 | 53,974 completions (2009) | 74,091 Completions (2014) | Not on track |
| Indicator: % of VET graduate with improved employment after training | 67.6% (2008) | 59.7% (2014) | Negative change |

1. Problem (b) – Quality – Private provider scandals

| Provider | Earnings before interest and tax (EBIT) (%) | | | |
|------------------------------|---|------|------|-----------------------------------|
| | 2011 | 2012 | 2013 | Last reported status on Web |
| Vocation | 6 | 18 | 21 | Collapsed 2015, Dawkins in court |
| Ashley Institute of Training | 35 | 35 | 35 | Trading halt 2016 |
| Intuerei | 29 | 31 | 35 | Quits Australia 2017 |
| Australian Careers Network | 46 | 40 | 51 | AFP Raid + in administration 2016 |

1 Problem (c) – Relevance (and churn)

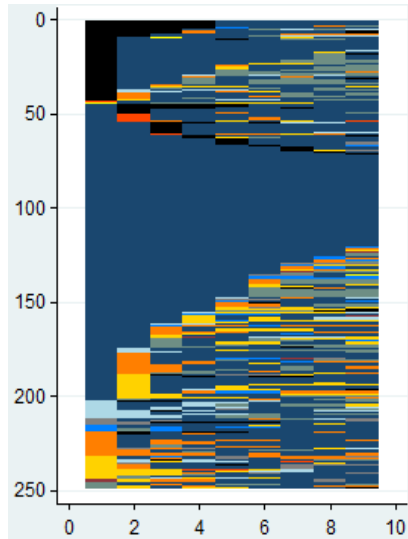
Employment, VET Training + Attainment, Aust Agriculture 2005-2011

| Average Employ- ment | Average Annual enrol- ments | Total VET complet- ions | Educational Attainment: VET (+Bachelors) | | |
|----------------------------|--------------------------------------|-------------------------------|---|----------------|--------------|
| | | | 2005 | 2011 | 2015 |
| 323,000 – 353,000 | 85,000 | 160,000 | 29.2 (8.4) | 30.4 (12.4) | 29.5 (15) |

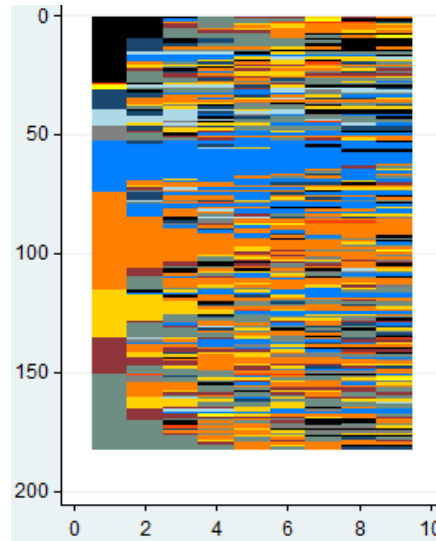
The rise in Bachelors degrees is not coming from career progression – but people come straight from Universities.

– Example: Agriculture

Farm managers



Manual workers in agriculture



2. Getting the questions right

- Where do we want to get to?
- What are the options for tertiary education?
- What are the implications for TAFE?

2. Getting the questions right:

(A) Where do we want to get to? (a) Objective

(i) maximising returns on human capital

=> priority on infinitely flexible labour

vs

(ii) Nurturing people living a lives they have reason to value

=> flourishing, productive citizens

2. Getting the questions right

(A) Where do we want to get to?

(b) Reference point for skills

(i) Competencies derived from current jobs

vs

(ii) Capabilities to adapt to an uncertain future

=> focus on job clusters + vocational streams

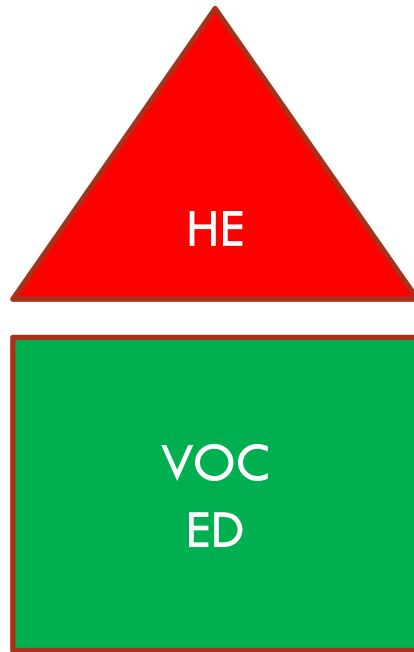
2. Getting the questions right?

(B) What are the options for vocational education?

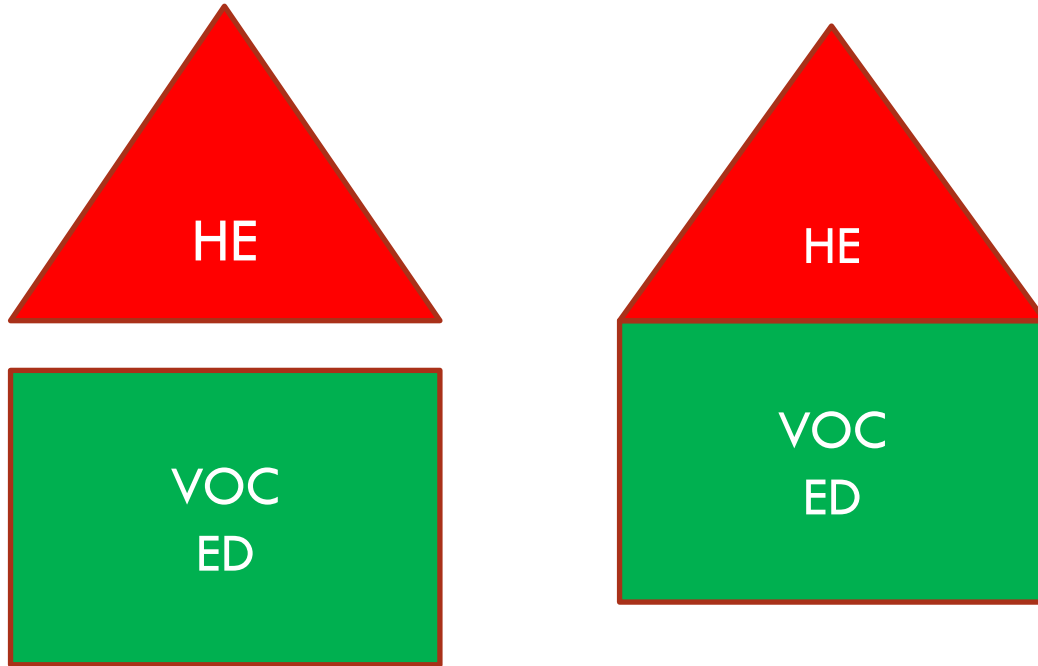
1. 'Ground hog day' (ie muddle through with TAFE as public sector rump)
2. University + labour market programs (eg Sweden)
3. Universities + TAFEs as integrated offerings (eg dual sector model)
4. Universities + TAFEs as parallel offerings (eg Ontario, Germany, Denmark)

WAYS OF ORGANISING POST-SECONDARY EDUCATION SECTORS

HIERARCHICAL



(DUAL SECTOR INSTITUTES)

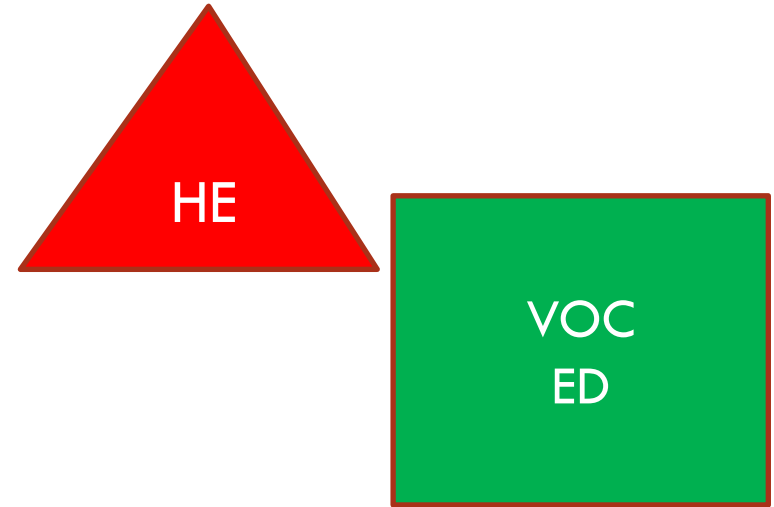
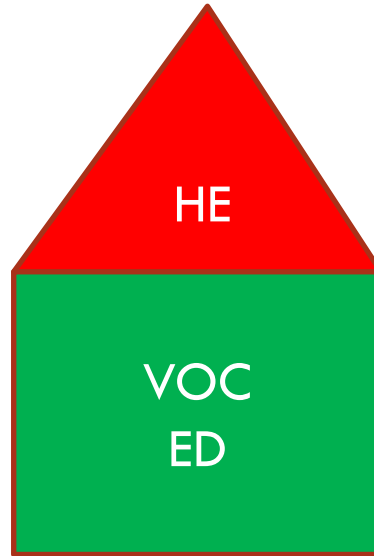
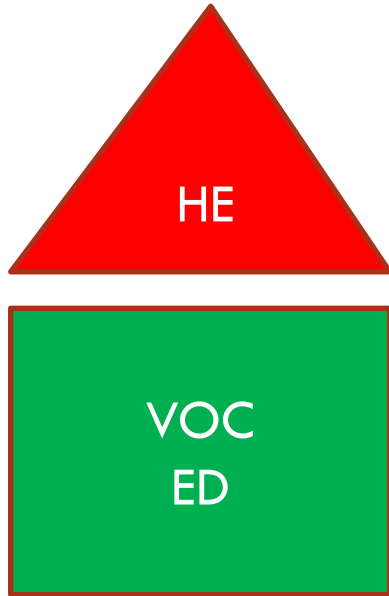


HIERARCHICAL

INTEGRATED

PARALLEL

(DUAL SECTOR INSTITUTES)



2. Getting the questions right

(C) What is the role of TAFE?

(i) Just another RTO with CSO payments

vs

(ii) Anchor for quality vocational education

3. Next steps

1. Stabilise TAFE as prelude to renewal of vocational education
2. Qualifications rationalisation: beyond administrative rationalisation => foundation for new relevance + respect
3. Kangan Style consensus building Commission (and recent lessons from Gonski Commission)
4. Intermediary structures: don't just restore old AWP/PA/Skills Australia/Industry Skills Council model
 - Take tertiary education to the next level – lessons from Health policy (eg Aust's bipartisan, nationally lead, community based response to AIDS Crisis and emergence of bipartisan commitment to universal health insurance).

Conclusion

‘The Emperor has not clothes’

— system is broken

The choice: VET crisis management or renewal of vocational education?

Vision for TAFE: recipient of ‘community service obligation’ funding or anchor to quality vocational education?

Remember Hobbes: time to change the terms of debate.

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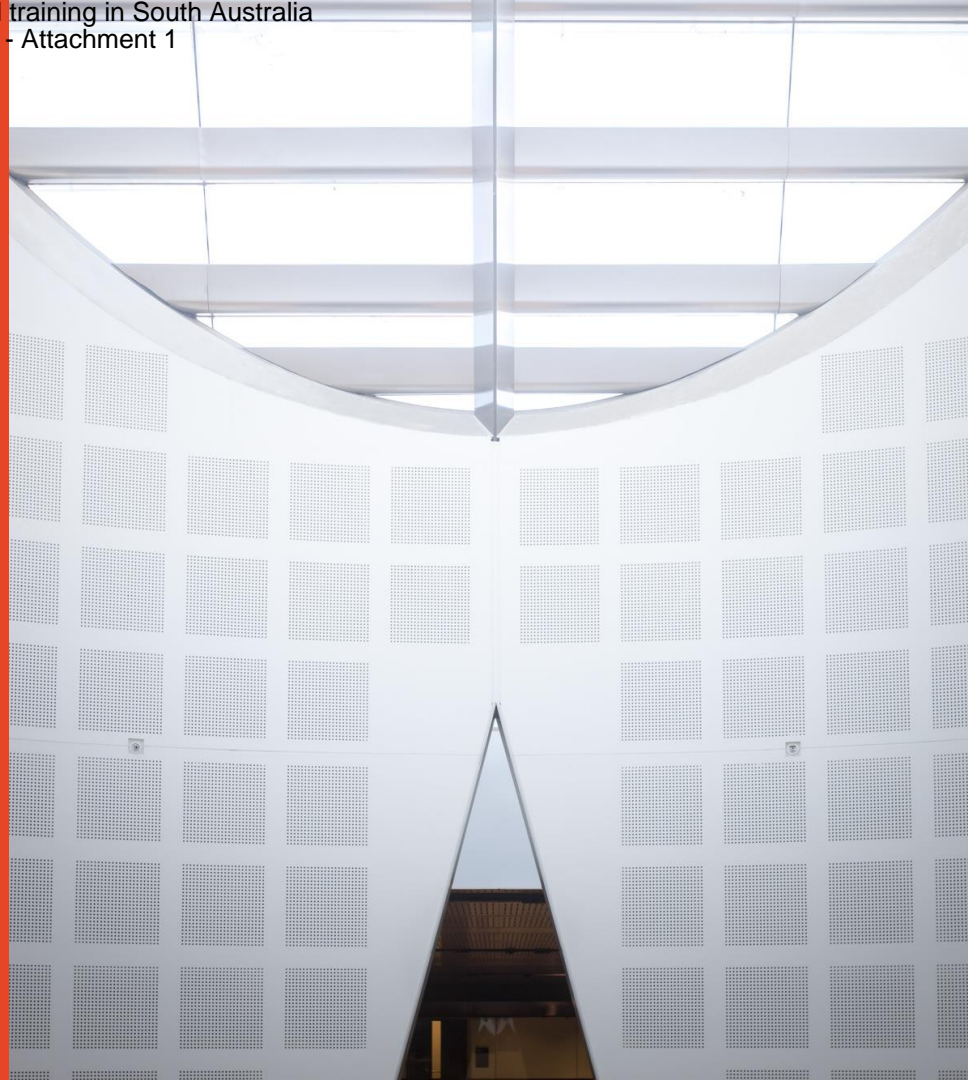
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Supplementary powerpoints – material used at recent ILO Asia- Pacific Workshops on Skills and Inclusive Growth (Oct 2017)



Context – ILO Asia Pacific Policy Research Agenda

– Question of immediate interest:

What approaches to skill development are best for assisting young people navigate the future of work?

Skills for the 21st Century – Solution or problem?

| Foundational literacies | Competencies | Character qualities |
|---|---|---|
| <ul style="list-style-type: none">1. Literacy2. Numeracy3. Scientific literacy4. ICT literacy5. Financial literacy6. Cultural + Civic literacy | <ul style="list-style-type: none">7. Critical thinking/problem solving8. Creativity9. Communication10. Collaboration | <ul style="list-style-type: none">11. Curiosity12. Initiative13. Persistence/Grit14. Adaptability15. Leadership16. Social + cultural awareness |

Problem 1: 'The impossible dream...'

Australia: pursued 'employability skills' for 30 years. Is integral to competency based VET system. The design flaws are now manifest

- System fragmented and rigid
- Poor connection to the labour market
- Recent financial scandals have highlighted system design faults

Problem 2: Assumption about humans

21st Century skills may seem comprehensive, but they are not.

Compare with 4 **validated frameworks for human development**:

1. International Classification of Functioning (WHO/Medicine)
2. PERMA (Positive Psychology)
3. Non-cognitive factors (OCEAN) impact success at work
(Heckman from Economics)
4. Capabilities Approach (Sen and Nussbaum)

Gaps in 21st century skills framework

| Characteristic of human development | Where 21 st century skills line up (or are absent) |
|-------------------------------------|--|
| Physical | Absent |
| Psycho-social | |
| - Cognition | Narrow (eg 'capabilities' on critical thinking) |
| - Affect | Absent |
| - Social | Narrow (eg 'PERMA' on relationships) |
| - Meaning | Absent |
| Personality characteristics | Covered: Openness and conscientiousness Absent: Extraversion, Agreeableness, Mental Stability |

Problem 3: Assumption about skills

It is unhelpful to define these skills as 'generic' and assume they can be acquired in the abstract.

⇒ Paradox noted in diverse literatures

More often than not the development of specialised expertise is essential for developing employability skills.

Authorities

- Cognitive psychology
- Sociology of Education (eg Bernstein, Young, Wheelahan)
- Implications in practice:
 - Rise of the 'T' professional
 - Job clusters in the German and Swiss apprenticeship system (eg watchmakers)



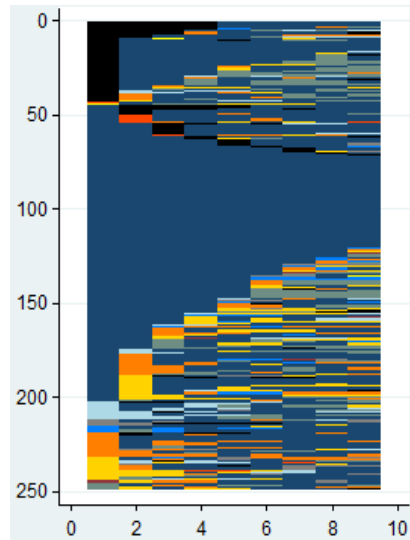
**Foundation for Young
Australians
New Work Mindset
7 job clusters**

***There are
combinations of skills
and attributes, or
capabilities, that are
common across many
different jobs.***

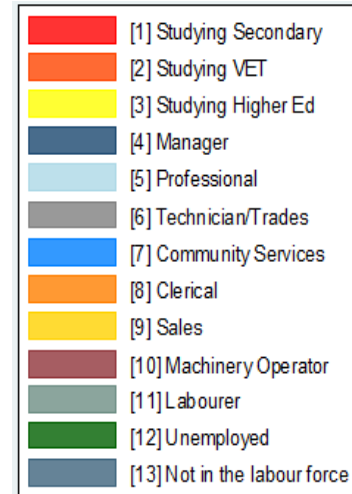
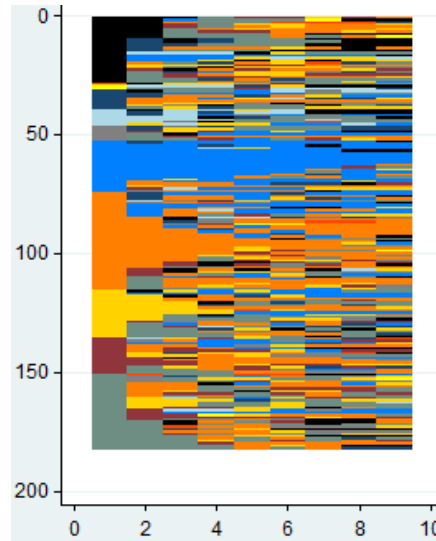
We see clustering in the flows of workers as they move between job, at least in some industries.

— Example: Agriculture

Farm managers



Manual workers in agriculture



The choice: competencies vs capabilities

| | Assumptions about humanity | Assumptions about skills |
|---------------------------------------|---|--|
| 21 st Century skills model | Infinitely flexible individuals are always deployed today => higher labour productivity | Ad hoc aggregations of competencies => just in time skills (but chronic failure to achieve this) |
| Capabilities approach | High functioning individuals ==> flourishing productive citizens now and in the future | Ensembles of related skills (job clusters/ vocational streams) ==> adaptive capacity to navigate the unanticipated |

Where next?

- In local labour markets (eg Narrabri NW New South Wales)
 - Qualifications to support adaptive capacity (eg ‘rural operations’)
 - Support movement between agriculture, construction, local government and mining
- In systems operations
 - Vocational Education Reform Research Collaboration (VERRC)
 - Three year program with voc ed and data science researchers working with government officials and researchers
 - Three strands
 - Qualifications rationalisation
 - Predictive modelling for service management
 - New framework for anticipating and responding the skills changes

Conclusion: learning from Chinese history

- Australia been trying to make employability skills + competency based training work for 30 years. The system is in lower standing now than it has ever been
- Time to call an end to the experiment and work with not against reality
 - Capabilities and job clusters/vocational streams offers a way forward.
- In realm of voc ed, Australia is at cross roads like China was in political-economic policy in the early 1960s. Remains to be seen whether we'll be subject to a VET cultural revolution – or whether reason will prevail => work with reality.

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http://www3.weforum.org/docs/WEF_FOW_Reskilling_Revolution.pdf

More details about frameworks for understanding human development and new ways of approaching vocational development

Human Development Framework 1: International Classification of Functioning (ICF) [from health]

- Physical functioning
 - Body structure/function
- Psycho-social functioning
 - Mental
 - Cognitive
 - Affect
 - Social
 - Communication
 - Interpersonal relations
 - Social functioning
 - Learning and applying knowledge
 - Self care

Human Development Framework 2: PERMA (from positive psychology, and some overlap with ICF)

- **P**ostive emotion
- **E**ngagement (flow)
- **R**elationships (positive)
- **A**ccomplishment/Achievement
- **M**eaning

Human Development Framework 3: Non-cognitive factors shaping labour market success (Economic, Heckman)]

Openness to experience

Conscientiousness

Extraversion

Agreeableness

Neuroticism/Mental Stability

(ie the OCEAN categories for defining and measuring character)

Human Development Framework 4: Human capabilities approach (social sciences/humanities)

Sen: '... human capital ... concentrates on ... human being augmenting production possibilities. human capabilities focuses on the ability ... of people to lead lives they have reason to value.'[2007:99]

Nussbaum:as applied to education this means in particular:

1. 'the capacity for critical examination of oneself + one's traditions'
2. The ability to appreciate deeper connections with humanity, not just your immediate reference group
3. 'narrative imagination' the ability to understand another's situation and experience of life

Skills for the 21st Century – Solution or problem?

| Foundational literacies | Competencies | Character qualities |
|---|---|---|
| <ul style="list-style-type: none">1. Literacy2. Numeracy3. Scientific literacy4. ICT literacy5. Financial literacy6. Cultural + Civic literacy | <ul style="list-style-type: none">7. Critical thinking/problem solving8. Creativity9. Communication10. Collaboration | <ul style="list-style-type: none">11. Curiosity12. Initiative13. Persistence/Grit14. Adaptability15. Leadership16. Social + cultural awareness |

Alpha Beta + Foundation for Young Australians 'job clusters'

- 'when a person trains or works in 1 job, they acquire skills for 13 other jobs' (FYA/Alpha Beta 2016: 4)
- There are seven job clusters
 - 'The Informers' (142 occupations within this cluster)
 - 'The Carers' (131)
 - 'The Artisans' (118)
 - 'The Designers' (70)
 - 'The Generators' (65)
 - 'The Coordinators' (59)
 - 'The Technologists' (10)

Source: Foundations for Young Australians/Alpha Beta, The New Work Mindset: 7 new job clusters to help young people navigate the new work order, November, 2016
<https://www.fya.org.au/wp-content/uploads/2016/11/The-New-Work-Mindset.pdf>

Compare to current policy in Agriculture: too many qualifications?

— In agriculture for example:

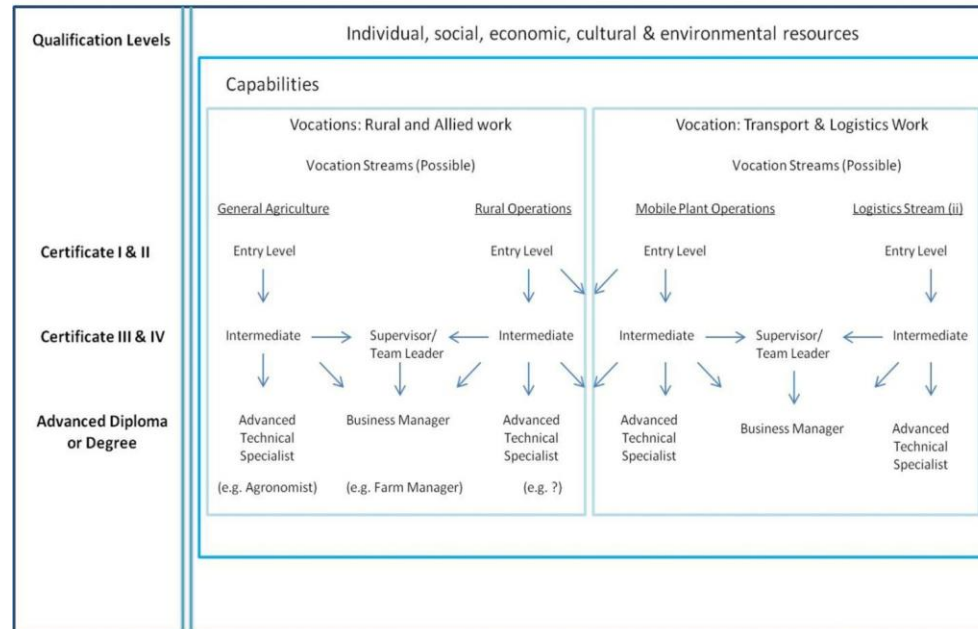
| Qualification level | No. Available |
|---------------------------------|---------------|
| Certificate I | 13 |
| Certificate II | 36 |
| Certificate III | 70 |
| Certificate IV | 38 |
| Diploma | 33 |
| Advanced Diploma | 5 |
| Vocational Graduate Certificate | 1 |
| Vocational Graduate Diploma | 1 |
| <i>Total</i> | <i>197</i> |

Rethinking the question: Vocations and the capabilities approach

| Elements of capability/ domains of expertise | Qualifications | | | | |
|--|---|--|--|---|---|
| | Common Core | Certificates II, III + IV | | Diploma | |
| | Foundations knowledge + skills at intermediate level | General Agriculture | Rural Operations | Agriculture | Business Management(Agriculture) |
| Agribusiness (eg financing, marketing, economics) | Structure of ag sector + basic clerical + HR skills | Common core | Common core | Common core | More advanced (to articulate into Business/management degree) |
| Sustainability practices (eg water, land, carbon management) | Basic principles + standard operating procedures | Common core | Common core | More advanced core | More advanced |
| Operations of machinery + technology | Advanced operational + routine maintenance principles | Common core | <ul style="list-style-type: none"> - Operation, transport + maintenance of mobile plant + specialist machinery - operation + recovery of 4 wheel drives - cleaning machinery of plant, animal + soils - welding using manual + gas metal arc welding - traffic controls | Common core | Common core |
| Production systems (eg irrigation + fertiliser use) | Understanding farm production systems | Common + specialism relevant to chosen area | Common + specialist knowledge re chemical application, transport + storage | More advanced | More advanced |
| Animal science + husbandry | Animal performance nutrition + breeding | Common + specialism of either: <ul style="list-style-type: none"> - intensive animal production - extensive animal production | Basic/common – ie working knowledge to help with how deploy equipment | More advanced (to articulate into a Ag Science degree) | More advanced – but not necessarily to articulation level with HE |
| Land, plant + crop science | Land, plant + crop production/management | Common + specialism of either: <ul style="list-style-type: none"> - intensive production of horticulture for food - amenity horticulture | Basic/common – ie working knowledge to help with how deploy | More advanced (to articulate into an Ag Science degree) | More advanced – but not necessarily to articulation level |

Rethinking the question: Vocations and the capabilities approach

Relationship between capabilities, vocations, vocational stream & qualification levels; potential examples from Rural and Logistical Work



New categories – a summary

How a capabilities approach enriches notions of labour supply and labour demand and how they interact

