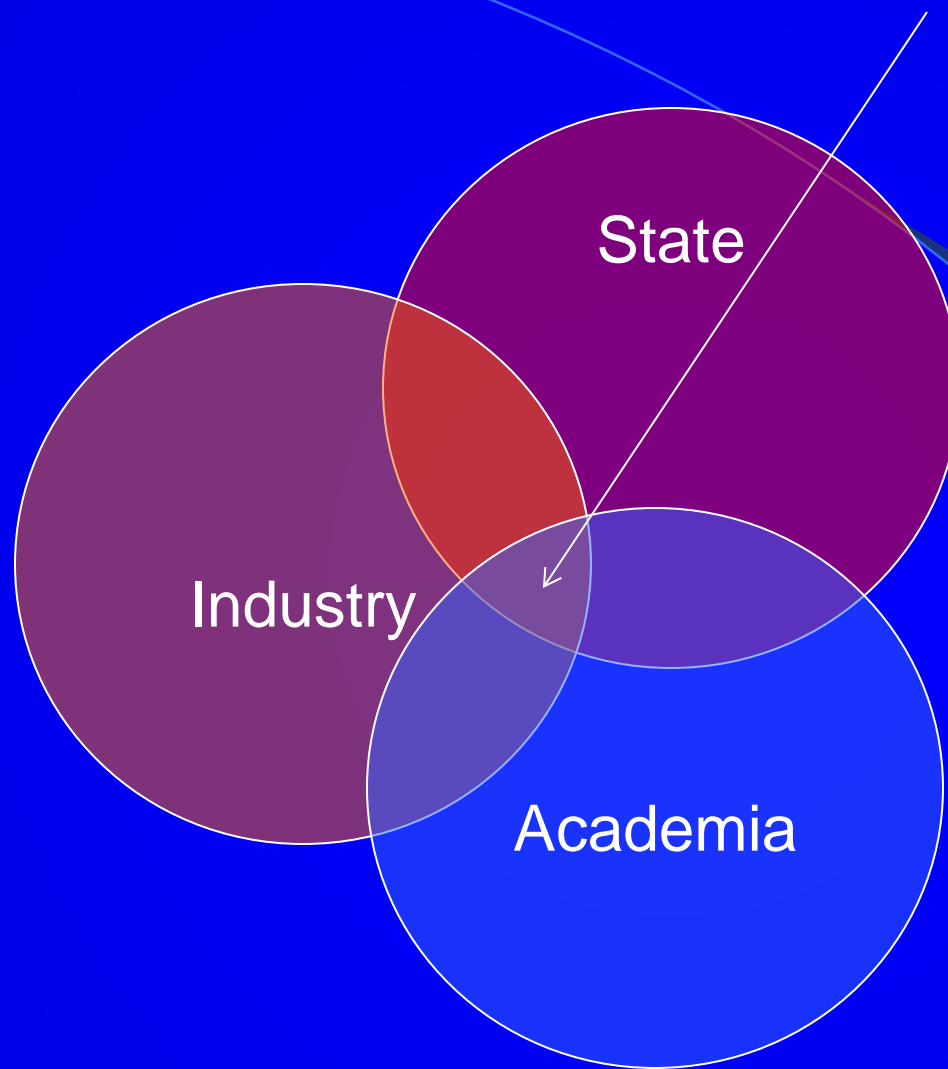


“Innovation in Innovation” Moving Beyond Boundaries to Triple Helix Hybrid Spaces

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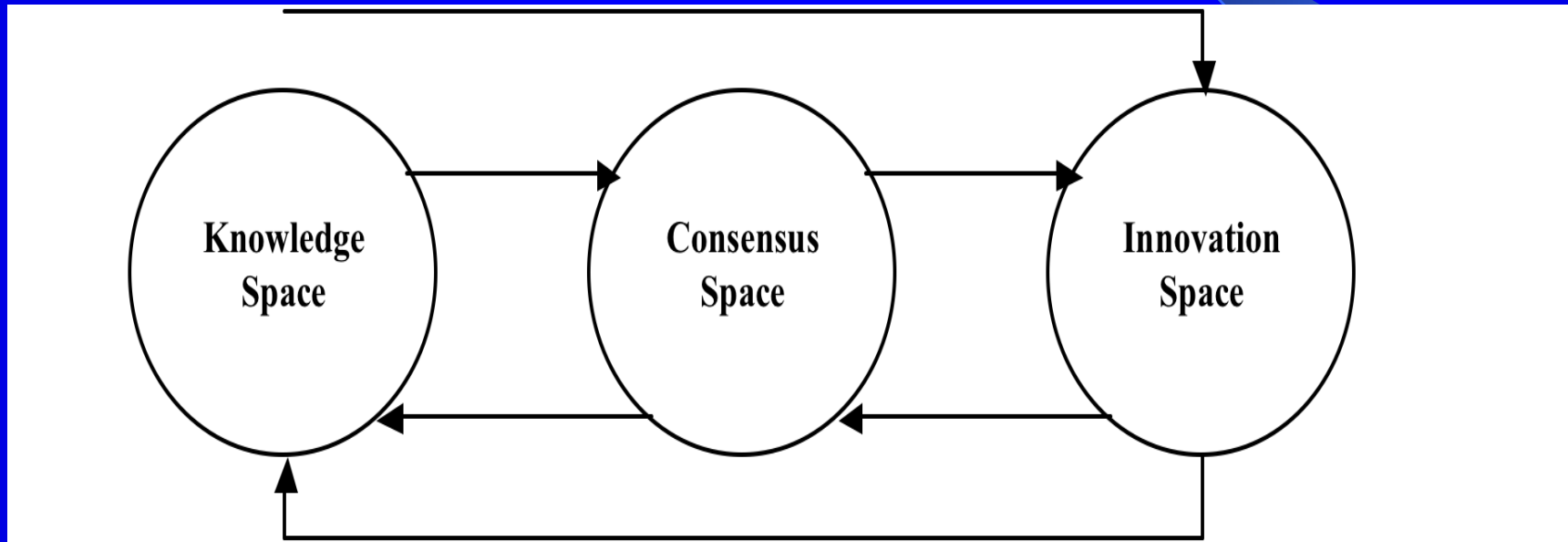
Innovation at the
Intersection of
Institutional
Spheres

Triple Helix Thesis

- Polyvalent Knowledge: multiple simultaneous characteristics e.g. publishable and patentable
- University plays leading role in Knowledge-based Society: shift from secondary to primary institutional sphere; 2nd Academic Revolution
- “Taking the role of the other” Raised from Individual Level (Mead, 1934) to Institutional Level e.g., university firm formation; public venture capital; industry “universities”

Triple Helix Spaces

- Linking knowledge, innovation, governance and leadership



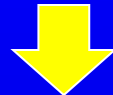
Regional Innovation Organizer

A semi-conductor model

- From Boundary Work (Gieryn, 1983), a defensive Model to “Boundary Play” (Etzkowitz and Champenois, 2013) with:
 - Boundary Regulation: Douane
 - Crossing Assistance: Passeur
- Resource scarcity as stimulant to boundary crossing
- Circulation among the helices and multiple roles e.g. “Dual Life” persons

Newcastle Professors of Practice (PoP)

- From US 1/5th Rule to European 1/2 Uni-Ind Roles
- UK Experiment: Turns PoP model “on its head” from teaching to research
 - Forward linear: faculty entrepreneurs moving 1/2 time to Industry
 - Reverse linear: Industry entrepreneurs (PhDs) moving 1/2 time to University



Self-sustaining virtuous circle between University and Industry

Can a teaching university be an entrepreneurial university?

- Oregon Shakespeare Festival (OSF)-> theatre cluster
- Ashland, Oregon transition from industrial to arts and humanities town
- Research Uni capitalizes new knowledge; teaching Uni redistributes old knowledge
- Academic entrepreneurship-> civic entrepreneurship->cultural-entrepreneurship>business entrepreneurship

An Innovation Response to the Economic Crisis?

- 1930's Depression : Underutilized Industrial Capacity
- 2nd Great Depression: Underutilized Intellectual Capacity
- CIRM (California Institute of Regenerative Medicine) Model: \$3 billion 10 year bond funds= S&T as Infrastructure - “roads and bridges” of the Knowledge Age

The Paradox of Success

Stanford's Underutilized Entrepreneurial Potential

- OTL Focus on Serial Entrepreneurs
- Many academic inventors under-supported
- “If its not broken don’t fix it” fallacy
- We say: “If its doing well; make it better”
- AUTM Report: 7 Stanford Start-ups per annum
- Start X Student Government Accelerator: 12 Start-ups per academic quarter since 2010
- Persisting “wet lab” incubator Gap: StartX Med

Triple Helix Association

www.triplehelixassociation.org

- International Conference Series, from 1996
Amsterdam, New York, Rio-de Janeiro, Singapore +
- TH XI 8-10 July 2013 London: **The Triple Helix and Open Innovation: Twins or Rivals**
- **THXII 2014 Tomsk, Russia**
- Helice: Quarterly Newsletter and Magazine
- Triple Helix: A Journal of University-Industry-Innovation and Entrepreneurship, Springer, 2014
Launch, Open Access, Inaugural Issue “Innovation’s Future” Abstracts in UN Languages+Portuguese