National Research Center[cte]
University of Louisville

A Cross-State Comparison of Postsecondary CTE Student Graduation Rates and Completions: Determining the Efficacy of Using IPEDS Data for Perkins Reporting

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NRC CTE
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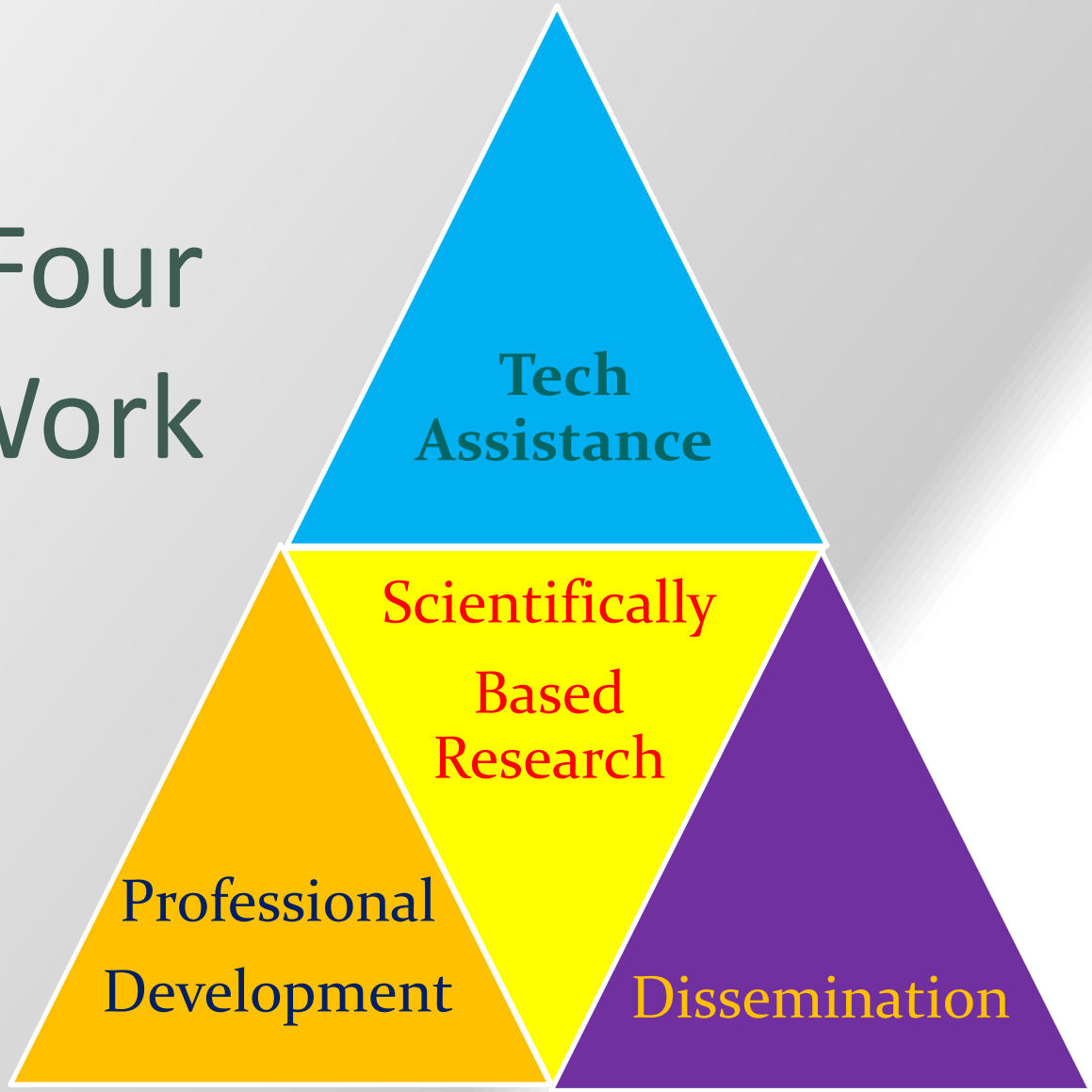
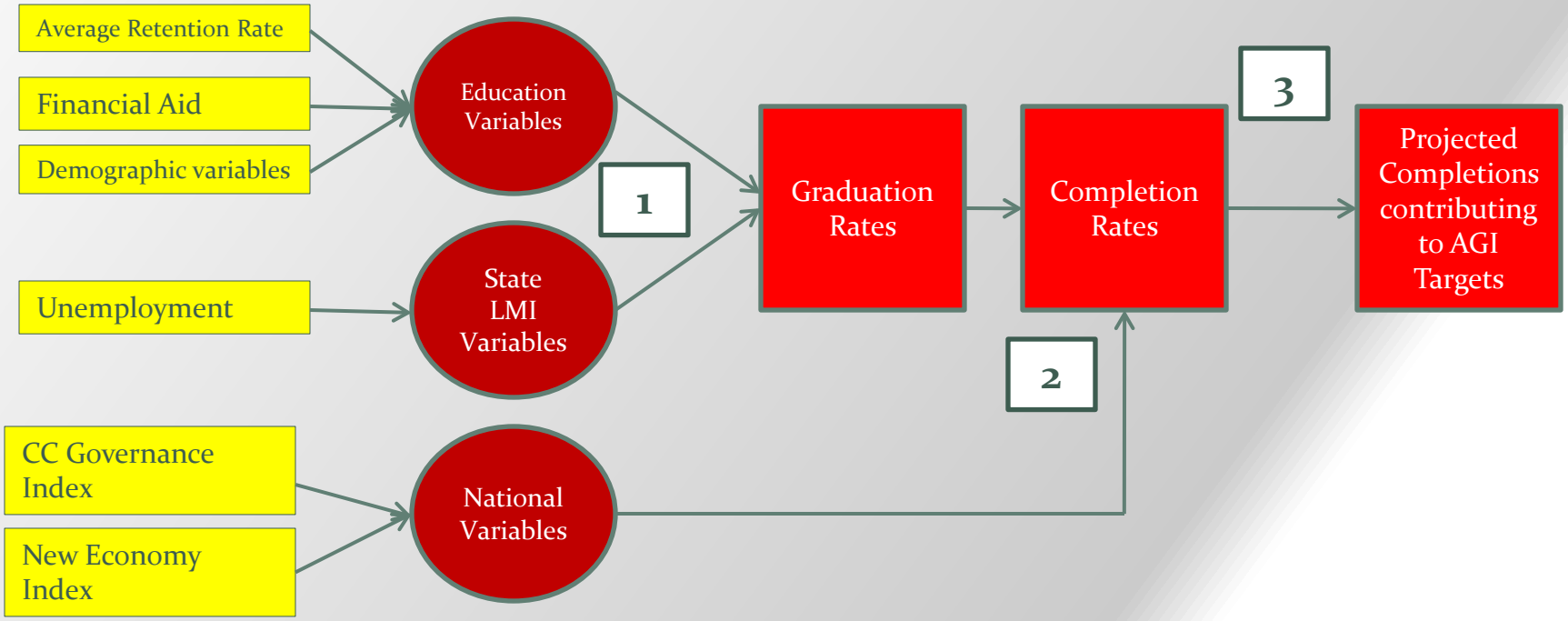
The Center - RFP

Purpose . . . to carry out scientifically-based research and evaluation, and to conduct dissemination and training activities consistent with the purposes of the Act.

The RFP: Four Plans of Work



LOGIC MODEL


Average Retention Rate
Financial Aid
Demographic variables
Education Variables
1
Unemployment
State LMI Variables
Graduation Rates
Completion Rates
3
Projected Completions contributing to AGI Targets
2
CC Governance Index
New Economy Index
National Variables

DATA SET

- Sample from 1,024 Two-year Title IV Colleges in 44 States.
  - Sample delimited to States with five or more public degree granting community colleges.
- Awards Included:
  - Associates degrees up to two years,
  - Certificates 1 – 2 years
  - Certificates 1 year or less

DATA SOURCES

- IPEDS Data Center (NCES/USDE)
  - (All education statistics)
- Bureau of Labor Statistics (USDOL)
  - (Labor Market Information).
  - Unemployment rate used is 4.5%
- Community College Governance Index (Lovell and Trouth, 2004).
- New Economy Index(Progressive Policy Institute)

Assumptions

- Unemployment rate remains at 4.5 percent
  - Same as base year 2006.
- Absolute rise in New Economy Index as a measure of Global Competitiveness.
- Independent and dependent variables are related linearly

Methodology: Simulation Exercise

- Regression #1: *Estimated Graduation Rates*
- Objective to obtain the predictive value for Graduation rates for each of 44 states.
- Regression analysis with Several IVs to predict DV: Graduation rates (First Time, Full Time)
- Selected IVs that were significant = <.10

Methodology

- Regression #2: *Estimating Completions*
- Objective: To predict completions per 1000 enrolled (Weighted across states)
- **DV:**
  - Completions/1000 enrolled students
- **IVs:**
  - Predicted Grad Rate
  - Community College Central Governance Index
  - New Economy Index (2008)

Methodology

- Trend Analysis: *Enrollment Projections*
- Used IPEDS projected enrollment to 2017
- Estimated the three subsequent years 2018/19/20.
- Used 2006 as Base year for prediction of 2020 Graduation rates
  - Go to Paper Handout

Results and Conclusions

- LMI is an important predictor of AGI success.
  - Higher unemployment rates which generally result in rising enrollments, predicts a decrease in completions.
  - *See Input Changes*[0]
- Rising unemployment is a drag on completion rates.
  - Graduation rates variable is lower and completions remain unchanged
  - *See Input Changes*[1]

Results and Conclusions

- Academic and student support important for raising graduation rates but impact on completions small
  - College improvements in Retention Rates, Financial Aid Awards, Percent First-Time Minority in All First time Students has an increasing but the effect is small if there is no reinforcement from a lower unemployment rate.
  - *See Input Changes*[2]
- Impact of Global Competitiveness (Absolute Rise in NEI)
  - Reinforcing effect on graduation rates and completions
  - *See Input Changes*[3]

Implications

- As enrollments rise, academic and student support become even more crucial for raising graduation rates and increasing completions
- Lowered unemployment rates will provide positive externalities to college-led solutions for raising graduation and degree completion rates
- Higher global competitiveness requires "right-skilling" that better matches education to employment but also requires managing the swirl that occurs between education and employment

Limitations

- Not a structural model.
- Did not examine the enrollment status
  - Full-time vs. Part-time enrollment
  - Implications for Financial Aid awards which are currently limited to full-time students.

Next Steps

- Do analysis at the college level
  - Limitation: LMI may not be robust enough
- Reevaluate how effective governance is derived.
  - Centralization vs. non centralization
- Distinguish contributions of Certificates vs. Degrees.

Next Steps

- Critically analyze the concept of global competitiveness.
- Examine more deeply responsiveness of the community college system for the ensuring higher underserved graduation rates.
- Revisit the secondary to postsecondary pathways (POS) discussion.

Using IPEDS for Perkins: A Poor Fit?

- IPEDS focuses much of its data collection and reporting efforts on first-time, full-time students, a population that does not fully represent the postsecondary CTE populations that most states serve.
- The IPEDS data do not explicitly distinguish CTE data from the data collected for all programs.
- Information could be imputed from the program data submitted by colleges, but at an aggregate level making the calculations of Perkins performance measures difficult

Using IPEDS for Perkins: A Poor Fit?

- At present, only awards (completion) data are directly obtainable through IPEDS.
- Enrollment and performance data are not directly available, nor can they be imputed from what is currently available within the IPEDS Data center http://nces.ed.gov/ipeds/datacenter.