Prison-based Education: Programs, Participation and Proficiency in Literacy/Numeracy

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Why do we study 3Ps?

- ► High incarceration rate in the United States (670 per 100,000 persons as per Walmsley 2018)
- ► Evidence correctional education enhances postrelease employability and reduces recidivism
- ► Lack of literature linking educational programs to literacy/numeracy skills needed for reentry

Why PIAAC?

- ▶ Using PIAAC data, we can
 - compare skills level and skills use between household and the incarcerated population
 - ✓ connect program, participation and proficiency

Selected research questions:

- ▶ Q1- What are the characteristics of the incarcerated population, relative to the household population (in PIAAC), vis-a-vis (a) education levels, (b) literacy/numeracy levels, and (c) use of skills in life and at work?
- Q2 What are the reasons reported by inmates for participating (or not) in the academic or vocational programs?
- Q3- Are inmates who participate in educational programs more likely to use more literacy/numeracy skills than non-participants?

Research methods

Q1 - Percentage of each population:

Education -

- Low (no high school diploma
- Medium (high school diploma and/or some college without degree)
- High (college degree)

Literacy or numeracy -

- Plausible values,
- Cut-off score
 of the PIAAC
 basic
 proficiency
 level (Level
 2)

Use of literacy or numeracy skills -

- often use
- rarely use

Research methods (cont.)

Q2 - Reasons for participating in academic or vocational programs

Percentage of inmates:

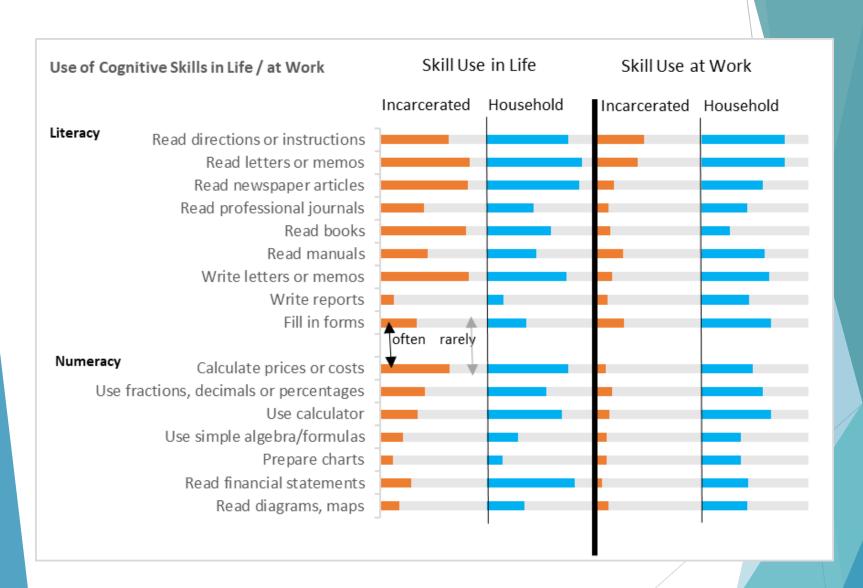
- ▶ required
- ▶ increase employability or self-improvement
- **▶** other

Research methods (cont.)

- Q3 Ordinal logistic regression:
 - ▶ DV- Number of literacy/numeracy skills used in prison life
 - ► IVs during the current incarceration,
 - (a) completed or not completed a higher education level
 - (b) participated or not participated in vocational programs
 - ► Controls
 - (a) proficiency level,
 - (b) Demographics (gender, age, race)
 - (c) inmates' desire to enroll in academic programs

Results of Q1 - Characteristics

- ➤ Only 6% of the inmates have high-level education, while 64% have medium-level, and 30%, low-level education (Household: 36% high, 50% medium, 14% low)
- ▶ 29% of inmates have literacy below Level 2 (household: 19%)
- ➤ 52% of inmates have numeracy level below Level 2 (household: 29%)



Results of Q2 - Reasons for participation

- ➤ 73% of the inmates who enrolled in basic skills programs wanted to improve themselves or increase their chances for employability
- ▶ 79% of the inmates who during the incarceration completed a level of education higher than the level they had prior to prison wanted to increase their chances for employability or for self-improvement.

Results of Q3 - Use of skills in prison

- Inmates who participated in vocational training were more likely to use more literacy and numeracy skills in prison than inmates who did not.
- Inmates who completed a higher education level during the current incarceration did not show higher likelihood to use more literacy or numeracy skills than inmates who did not complete.

Implications for policy and practice

- ► As almost one in three inmates have education levels lower than high school diplomas, expanding programs targeting basic skills is a must.
- ➤ Participation in vocational programs is positively associated with skills-use; career and technical education (CTE) need to receive more resources in correctional education.

Limitations and future study

- ► Longitudinal data are needed to link proficiency to program effectiveness and inmates' post release employment or recidivism.
- ▶ Demographic factors (e.g., race) should be studied to identify possible cultural differences in the use of cognitive skills.

Thank you!