

# GIS

GEOGRAPHICAL  
INFORMATION  
SYSTEMS



## GIS FOR ACCOUNTABILITY REPORTING

# SOCIAL SECURITY PROGRAMS IN INDONESIA

Stimulus Report Fiscal Year 2010

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# BACKGROUND

## Rationale

- (1) Provide transparency and context to data.
- (2) Show the effectiveness of investments
- (3) Helps government leaders make informed decisions for the greatest good.

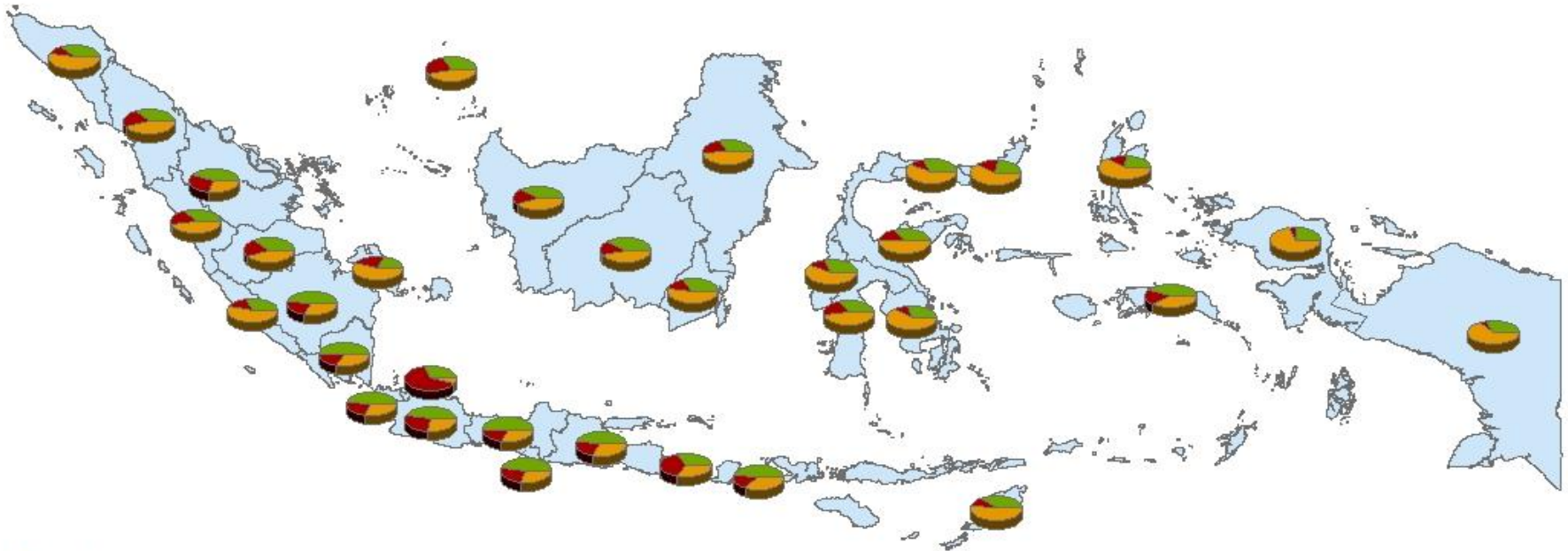
## Memorandum

- The maps reflect economic condition and fiscal stimulus in 2010.
- They are all preliminary findings and result of data aggregation.
- **NEW!** The information on some entitlement programs while not reported detail in the national budget report or Annual Government Work Plan are included on the maps.

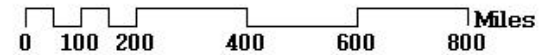
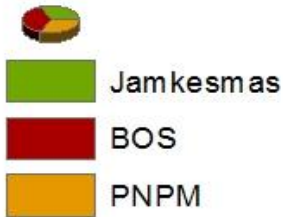


# Grants Distribution

# Proportion of Grants



Grants on:  
Health (Jamkesmas)  
Education (BOS)  
Infrastructure (PNPM)



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Data Source: TNP2K, Ministry of Social Affairs, 2011  
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# Proportion of Rice Subsidy (RASKIN) in Each Province



## RASKIN as Percent of Total



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Data Source: TNP2K, Ministry of Social Affairs, 2011





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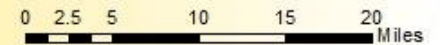
# Conditional Cash Grant



## Total Conditional Cash Grant

### PKH

	\$162,600.00 - \$1,000,000.00
	\$1,000,000.01 - \$3,000,000.00
	\$3,000,000.01 - \$6,000,000.00
	\$6,000,000.01 - \$8,500,000.00



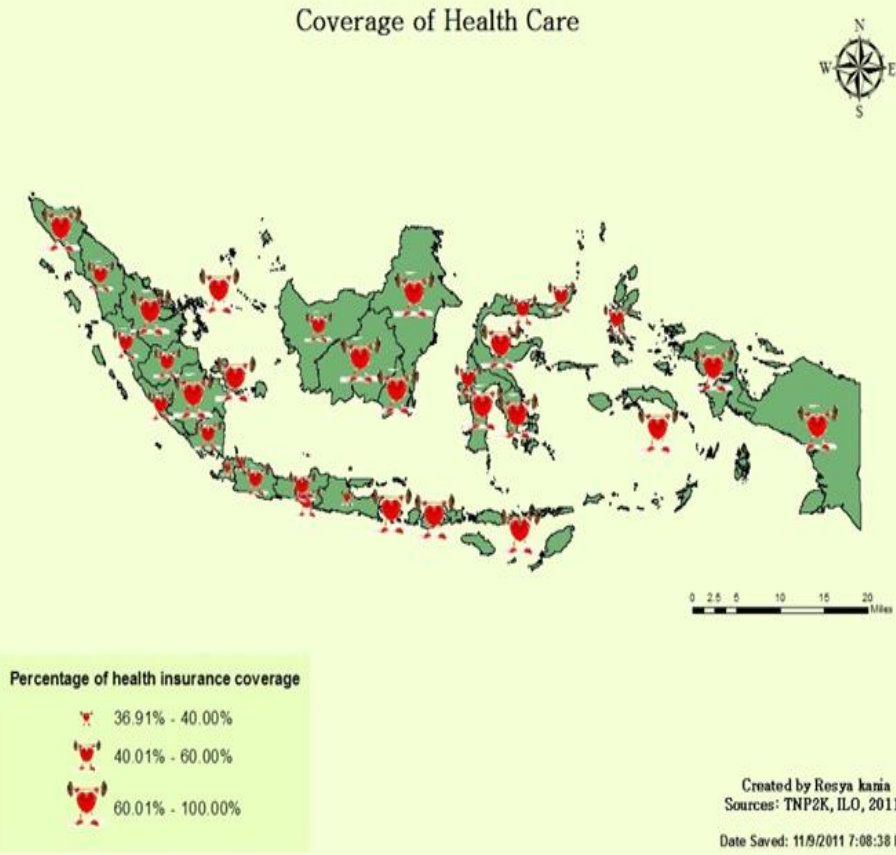
Created by Resya kania  
Sources: TNP2K, Bappenas, 2011.

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Coverage of Health Care



Proportion of Grants



(!) Higher percentage of coverage → Less amount of reimbursement

(?) What would explain the pattern:

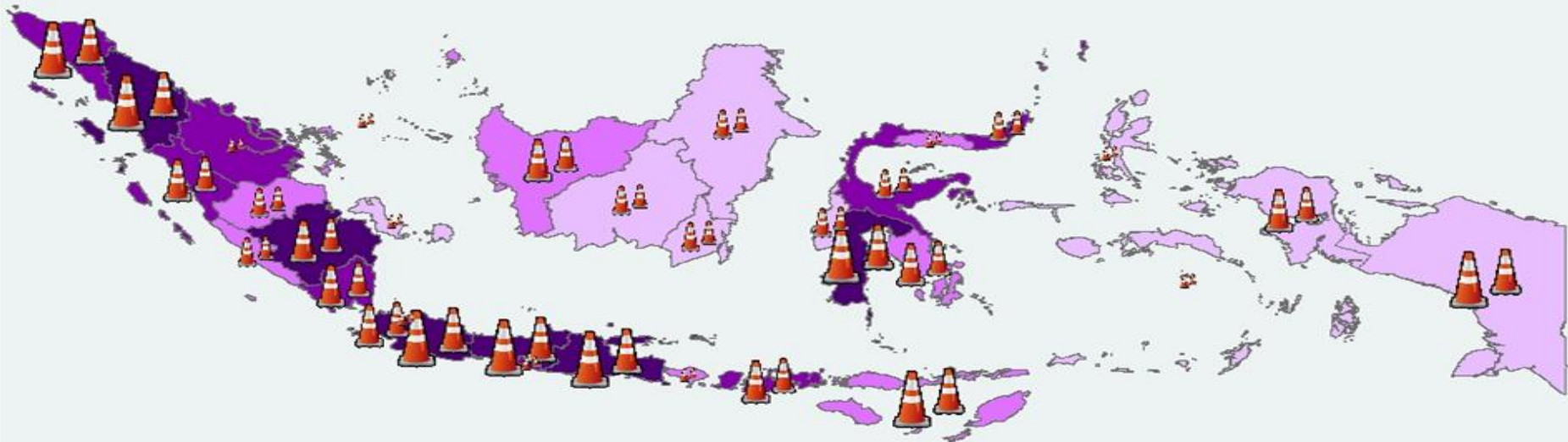
Cost of health care

Accessibility of health care

Leakage of funds

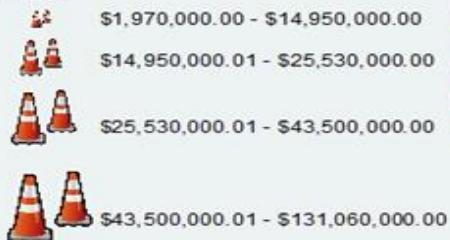


# Does Infrastructure Program Creates Jobs?

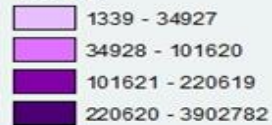


Unemployment and Grant for Infrastructure Program

## PNPM



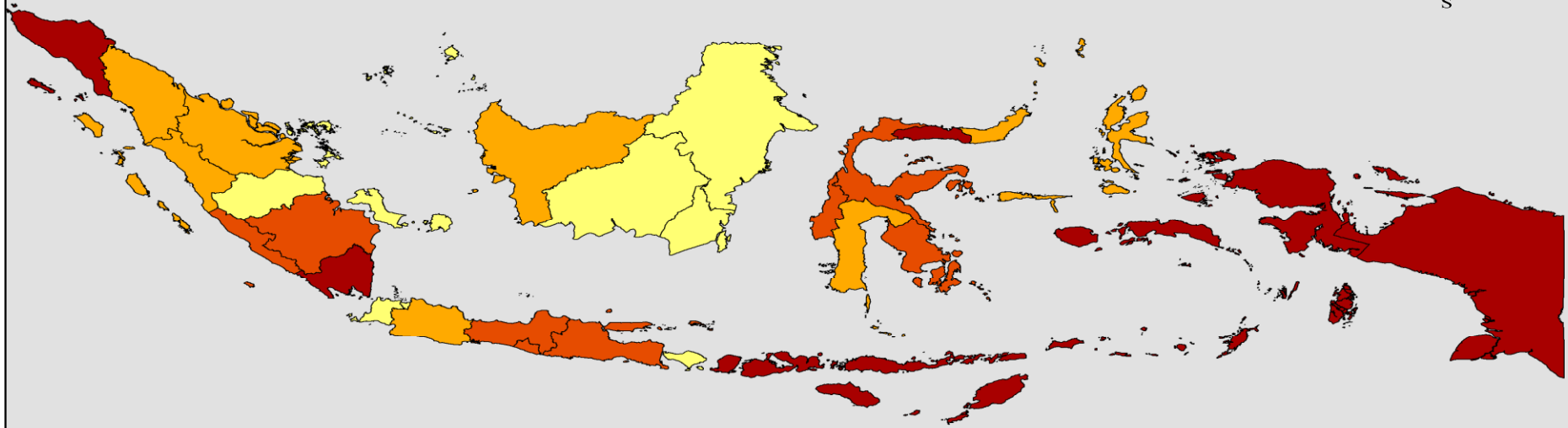
## Unemp



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Data Source: TNP2K, PNPM, 2011  
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- ✓ **Sumatera, Kalimantan, and Sulawesi:** The Intensity of infrastructure program is higher in province with higher unemployment level.
- ✓ **National Level:** No clear pattern

# Looking At The Effectiveness



0 100 200 400 600 800 Miles

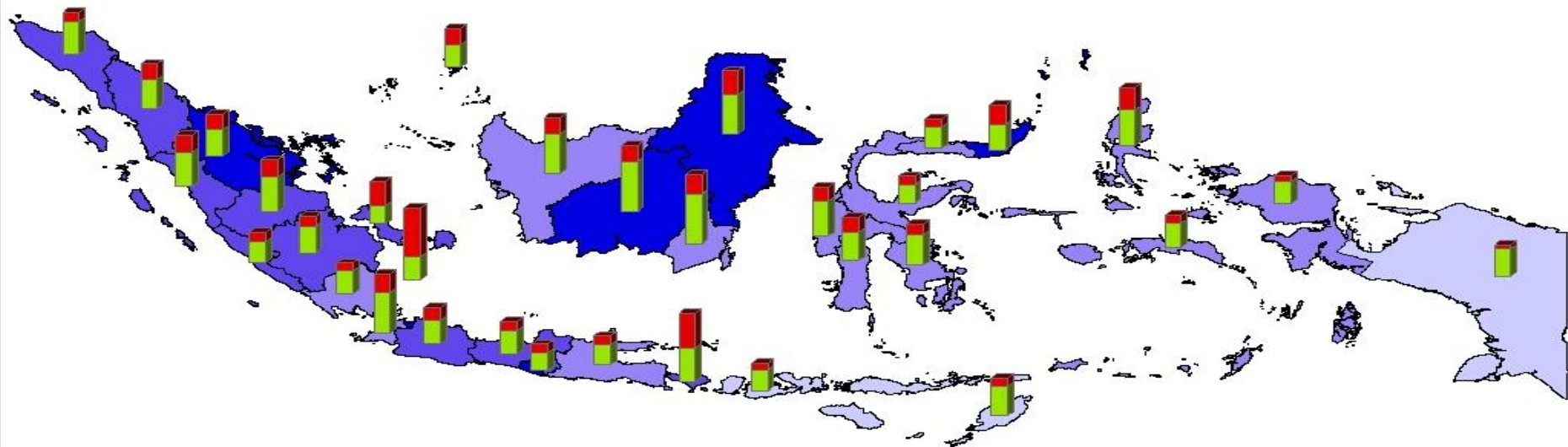
## Poverty Rate VS Total Grant

Total as Percent of Total	PovTot / Population
0.27% - 1%	3.25% - 7.81%
1.01% - 2.5%	7.82% - 11.48%
2.51% - 5%	11.49% - 18.94%
5.01% - 15%	18.95% - 33.7%

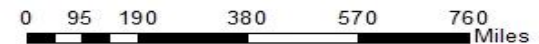
Created by Resya Kania  
Data Source: TNP2K, Ministry of Social Affairs, 2011  
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- Poverty rate was higher in eastern part of Indonesia. Yet, the grants on social security programs were mostly given to Java which had lower poverty rate.
- Government need to evaluate the selection criteria as well as quality of each program.

# Human Development Index and Social Investment per Capita



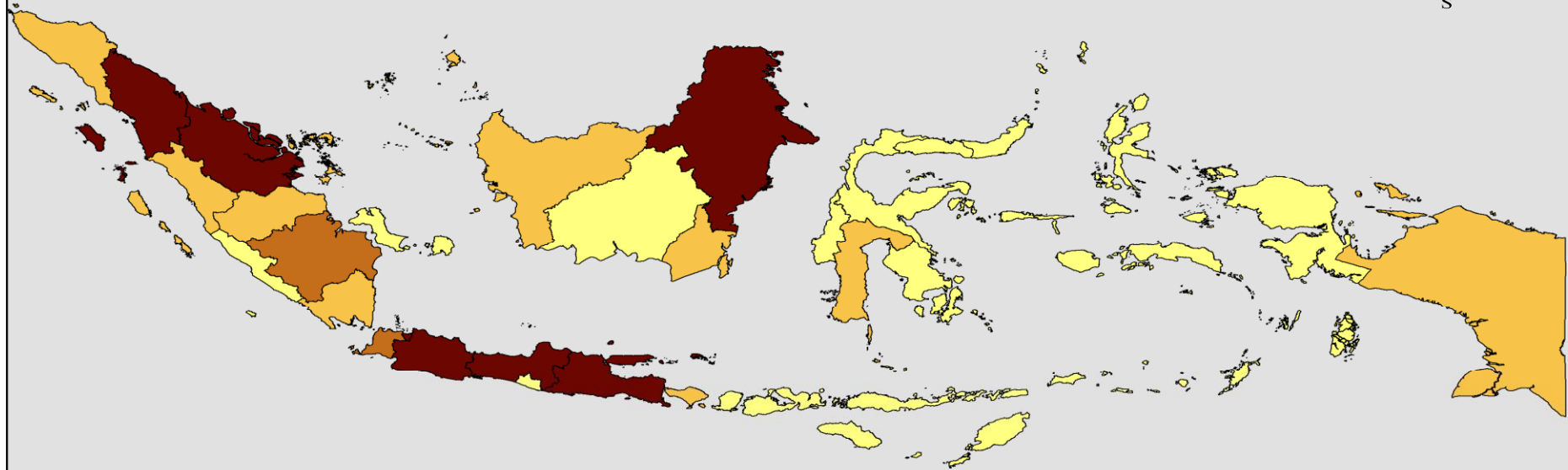
## Investment for Human Capital



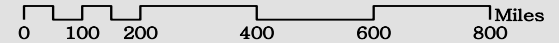
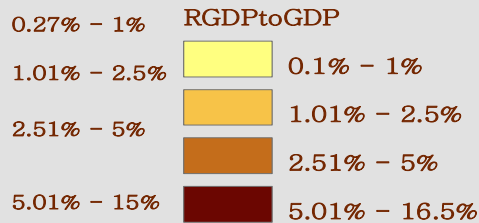
Created by Resya Kania  
Data Source: TNP2K, BPS, ILO and Ministry of Education, 2011  
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- ✓ **In general** investment per capital mostly devoted to health.
- ✓ DKI Jakarta and Bali allocated the most of the investment on education.
- ✓ Kalimantan and DKI Jakarta are those who have the highest investment per person.

# What You Give Is What You Get




Total Grant vs Regional GDP contribution



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Data Source: TNP2K, Ministry of Social Affairs, 2011  
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In general, it seems there was a positive relation between regional GDP and total grants; The higher contribution of regional GDP to national GDP, the higher grants received.



Thank You



**Professor Joe D. Francis**



**Keith Jenkins**

**TA FOR DSOC3140: Spatial Thinking, GIS, and Related Methods**

Xiaoling Li; Ben Hale ; Amit Anshumali